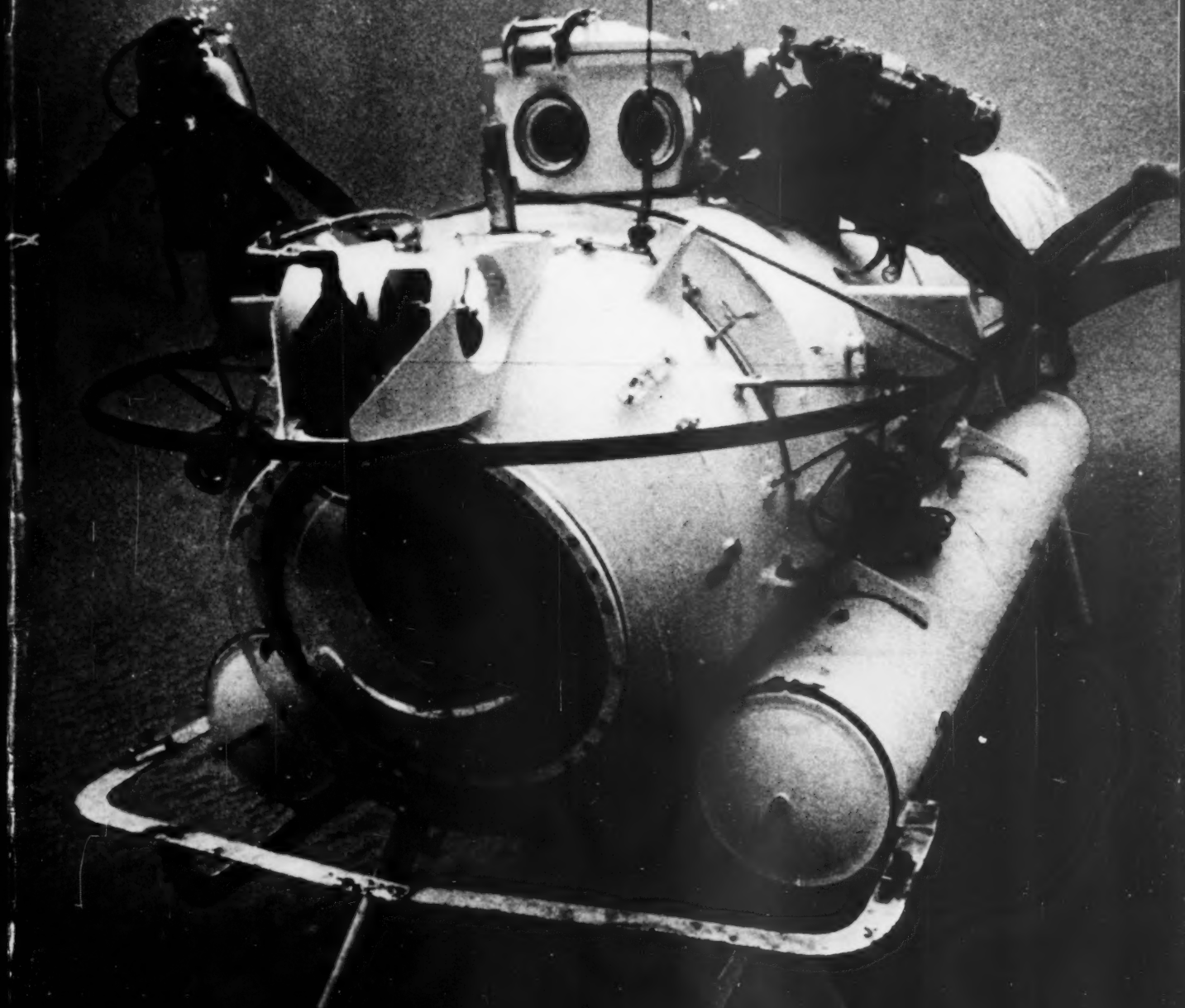
AUGUST 19, 1974

Commerce Today



Mini- Subs Join Offshore Oil Search

Resurgence Of The Merchant Fleet

This column was written by Under Secretary of Commerce John K. Tabor.

One of the more remarkable and gratifying developments in recent years has been the strong resurgence of the American shipping and shipbuilding industries as vibrant elements of the national economy.

Just five years ago both industries were in an advanced state of disarray, plagued by high costs, low productivity and an uncertain future. Two-thirds of the ships in the U.S. merchant fleet were of World War II vintage—too old, too small and too slow to compete effectively against the more modern fleets of other nations.

The obsolescence of the fleet stemmed from inadequate shipbuilding programs in the 1950s and 1960s. The low level of shipbuilding orders, in turn, compounded the problems of the shipbuilders. The paucity of contracts deterred the yards from making needed capital improvements to modernize their facilities, improve efficiency and reduce costs.

And it was quite obvious that existing federal maritime policies, centered in the Merchant Marine Act of 1936, were incapable of dealing effectively with our maritime shortcomings.

It was against this bleak backdrop that former President Nixon, during his first year in office, transmitted to the Congress a new maritime program to revitalize the American merchant marine. His program received the nearly unanimous approval by the Congress and was enacted into law as the Merchant Marine Act of 1970.

This law restructured and broadened federal maritime policies to provide the tools needed to restore the United States to the rank of a first-class maritime power.

The collective maritime industry—shipyards, shipping lines, management and labor—have responded affirmatively and effectively to the challenges and opportunities inherent in this program.

Today the American shipbuilding industry has the largest peacetime backlog of construction contracts in its history. Valued at $3.5 billion, these orders encompass six million deadweight tons of shipping which is equivalent to 40 percent of the size of the existing fleet.

Whereas the government was empowered to subsidize up to 55 percent of the cost of ships built under the previous maritime policy, the 1970 Act immediately reduced this ceiling to 45 percent and imposed further annual reductions until it drops to 35 percent in fiscal year 1976. All of the ships ordered under this law have carried subsidy rates within or below these guidelines. In fact, several of the more recent contracts for tankers and liquefied natural gas ships carry subsidy rates of only 16.5 percent to 33 percent.

Each of the new general cargo ships being built, because of their larger sizes and faster speeds, are equivalent to three to eight of the conventional ships in our fleets. And some of the new tankers will have a cargo capacity 12 times greater than the average tanker in our existing fleet.

Further increasing the productivity of these vessels are automated systems which permit greatly reduced crew sizes. As against the 40 to 50 man crews of older vessels, the new ships will carry crews of 26 to 32 men.

There are already indications that the resurgence of the American merchant marine is under way. Last year the fleet carried 39.8 million tons of U.S. foreign trade cargoes—a 67 percent increase over the 1972 volume.

We are confident that the infusion of ever increasing numbers of highly productive ships into the fleet will provide the United States with one of the most modern and efficient in the world by the end of this decade.

John K. Tabor

Commerce Today

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Under Secretary

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ARTHUR McDERMOTT
Associate Editor, Domestic Business

AMERICO A. W. FAVALE
Graphics Coordinator

Staff Writers: *Douglas F. Carroll, Felix Cotten, Margaret L. Hanson, Leslie Wilder.*

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COVER: *Divers inspect one of the mini-submarines being used in the North Sea to help offshore drilling engineers properly position their rigs to extract crucial oil from beneath the ocean. Subs have an important role in the worldwide search for additional energy sources as the story beginning on page 5 relates.*

Large Inventory Increases In Recent Quarters May Reflect Inflation, Other Special Factors

Economic Highlights is prepared by the Office of the Assistant Secretary for Economic Affairs.

Large additions to inventories in recent quarters have attracted considerable interest because of the key role business inventories have played in some economic slowdowns in the past. The inventory figures also are somewhat puzzling since the buildup has occurred during a period when many businessmen were complaining of shortages.

In mid-July, the annual revision in the National Income Accounts (NIA) showed that inventory accumulations for 1973 were larger than had been reported previously, and these additions to stocks continued at the unusually high annual rates of $16.9 and $15.1 billion in the first and second quarters of 1974.

Inventory changes are always subject to more than one interpretation, and analysis has become even more difficult in recent quarters because of rapid price rises, the oil embargo, and the manifold implications of shortages in the business community.

The revisions in the NIA figures on inventories were unusually large. The shift to a new benchmark for 1972 raised the level of inventories from 1972 to the present, and the inclusion of revised data for the final month of each quarter of 1973 altered the quarterly pattern, particularly for the fourth quarter when heavy inventory accumulations occurred in December.

The NIA accounts show the physical change in business inventories, expressed in either current or constant dollars. The change in inventory values that results from price changes in *existing* stocks is measured separately and is called the Inventory Valuation Adjustment. Adding the current-dollar change and the valuation adjustment produces a total that is roughly comparable to the inventory change reported by businessmen to the Census Bureau (as shown in Chart 1).

The economic disturbances of the fourth quarter of 1973 appear to have affected retail inventories first. As demonstrated in Chart 2, substantial jumps occurred in accumulations in October and November, but some easing was evident in December. At the wholesale level the jump did not occur until November, and the manufacturing level felt the impact the following month. Several months of up-and-down movements followed as the various levels of business sought to adjust to the uncertain economic situation. In June, however, the three levels had inventory accumulation rates that more closely approximated their respective near-term average rate of growth than at any time since last September.

For many analytical purposes, the detailed monthly manufacturing and trade series from the Bureau of the Census is more useful even though it does not include adjustments for price changes and does not cover agriculture, the extractive industries and construction. The impact of the oil embargo (and the consequent effects on the auto industry), other material shortages, and the food situation all become apparent in the Census figures.

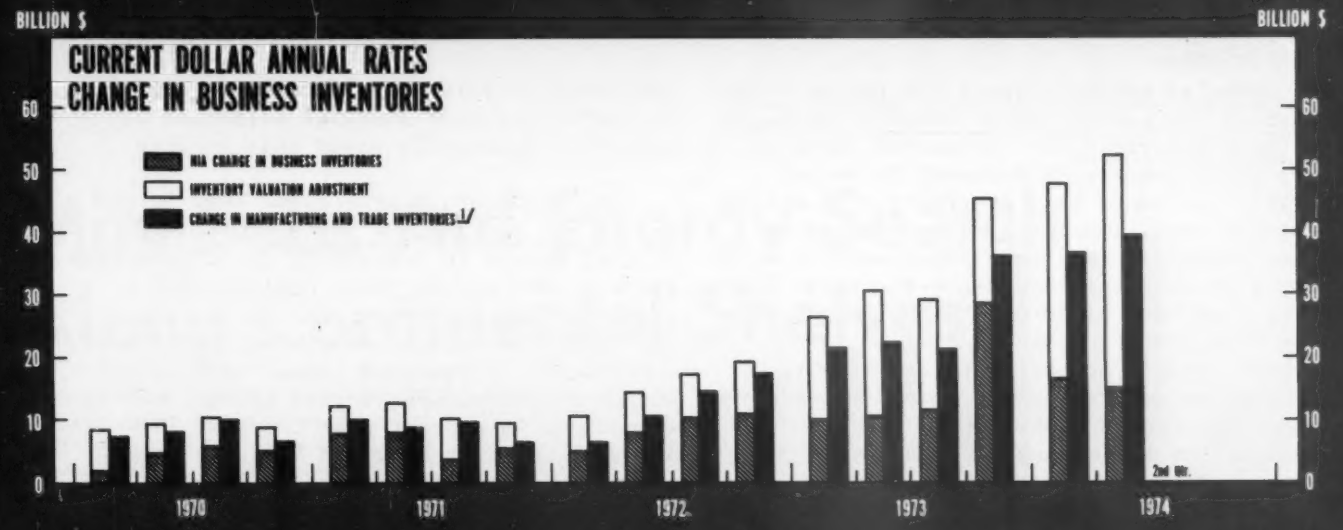
Retail inventory accumulations from November 1973 through May were affected by the sharp rise and the following decline in auto inventories. Inventories in this key industry had their sharpest gain in November and the steepest decline in March, with each succeeding decline progressively more moderate. During the same period, retail accumulations of non-durable goods inventories also increased sharply but have not yet eased appreciably. Much of the cumulative gain, however, is concentrated in food and energy and may be due mainly to price increases.

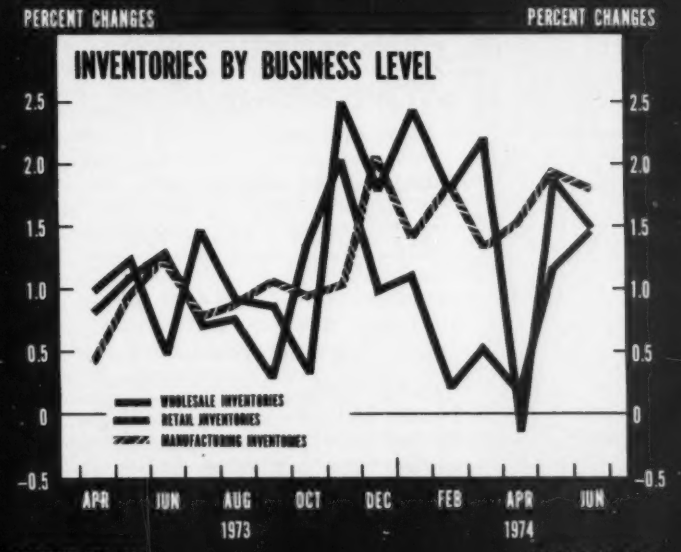
At the manufacturing level, the behavior of durable and nondurable goods inventories has not been unusually diverse. Autos were once again the major factor in the behavior of durable goods inventories at the end of 1973, but their role in the pattern of early 1974 is less distinct. Manufacturers' inventories of motor vehicles and parts declined in February and April but these declines are not evident in the durable goods totals. Clearly, other major influences were involved.

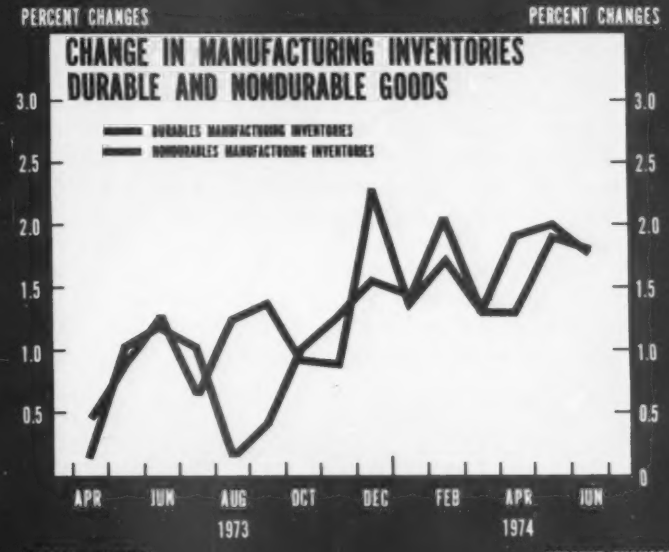
Nondurable goods inventory accumulation began accelerating after August and did not slow significantly until March. The inventory increases in the most visibly disturbed sectors—energy and food—do not appear to have played a key role in the month-to-month behavior of the nondurable goods inventory totals. Energy inventories climbed steadily from October through March (due chiefly to price increases), and jumped very sharply in April when the first post-embargo oil began to arrive in quantity. Food and kindred products inventories held by manufacturers have changed erratically with little discernable impact on total inventories.

A clue to the behavior of inventories for manufacturers of both durable and nondurable goods may be obtained from the figures on inventories by stage of processing. These data show that additions to materials and supplies inventories have far exceeded the additions to finished goods inventories. This may have been due to several factors: (1) more rapid price increases for materials than for finished goods, (2) the building of supply stocks as a hedge against future scarcities, and (3) problems in obtaining certain crucial supplies, causing complementary items to accumulate excessively. In any event, the accumulations of finished goods inventories do not appear to have been excessive, and the fear that producers are currently struggling with unwanted inventories of their products is not very persuasive.

In sum, the most extreme variations in inventories have been confined to only a few sectors of the economy, price increases have accounted for much of the reported accumulation, and increases in materials and supplies rather than finished goods have been most pervasive. More rapid inventory growth may be a poor prospect for real GNP expansion in the third quarter, but sharp declines seem equally unlikely.







1/All data seasonally adjusted
Manufacturing and trade inventories value at end of quarter, dollar changes at annual rates

Newsmemo

Loss of public respect for nature's resources has brought about today's shortages in many materials. Dr. Richard W. Roberts, who heads Commerce's National Bureau of Standards, makes this observation in noting how the traditional stitch-in-time-saves-nine admonition has been superseded by a throw-it-away, get-a-new-one attitude. Even worse, we have aimed our technology at making this condition acceptable. To turn things around, according to Dr. Roberts, we must target technology toward materials recovery, finding substitutes for scarce commodities and making materials more durable.

Will the diesel engine be powering more vehicles along America's residential streets? The newly-formed Massey Ferguson-White Motors Corp. plans to start production this fall in Canton, O., of a newly-designed lighter and quieter diesel engine. Auto industry observers believe an efficient lightweight diesel could eventually replace the traditional gas engines in about 25 percent of our multi-stop trucks. U.S. acceptance of diesel-powered passenger cars has been slow, but the pace can be expected to quicken as fuel costs and pollution considerations change vehicular power priorities.

Guidelines issued by the Environmental Protection Agency on curbs to effluents have resulted in the filing of more than 70 legal actions. An example is the petition filed by the National Forest Products Assn. which argues that the rules on timber product processing are unreasonably restrictive and result in major operational problems. Of the 70 suits, eight are by environmental groups over inclusion of variance clauses in the individual guidelines. The remainder are from industry and cover, among other things, protests over technical adequacy and lack of flexibility.

There have been notable shifts in the mix of demand for household appliances. Prompted by consumer fears of natural gas shortages, sales of gas appliances have suffered. Gas dryer sales are down 13 percent in the first five months of 1974 compared with last year's January-May period. Gas range shipments have dropped 21 percent. Freezers continue to be the fastest growing appliance in sales--up 39 percent over 1973. The potential meat shortage situation of mid-1973 undoubtedly aided this advance.

The industrial lathe as we know it today is not getting the job done. So says General Motors in describing its cooperative project with machine tool builders and a research firm to develop radically different turning machines. GM claims the present conventional production lathes have caused output per investment dollar to decline by as much as 40 percent over the past 20 years. But with new technology GM hopes to triple productivity per investment dollar. The project, under way for about two years, is expected to produce an advanced bar turning lathe and a high production chucking machine. A third machine, a high production grinder, is well along in design. Meanwhile, patent and proprietary design considerations are being ironed out.

The moves by Jamaica in June to get more revenue out of bauxite mining and alumina production have caused a chain reaction. Other bauxite producing nations now are seeking higher revenues. According to recent reports, Surinam, Guyana, Haiti and the Dominican Republic have approached U.S. aluminum companies, looking toward renegotiation of bauxite contracts. In most cases the emphasis is on increasing the tax rate. Some nations, however, are pressing for increased U.S. investment in bauxite and alumina facilities. Others are also said to be interested in acquiring partial equity in U.S.-owned facilities within their borders.

The housing slump is easing the tight supply situation for several key building materials. Lumber, brick, vitreous plumbing fixtures, gypsum wallboard and lath are now easier to obtain, except in a few local situations. Demand for cement and concrete products is only slightly down, because nonresidential construction continues at high levels. Supply problems continue in asphalt roofing and insulation. The steel shortage in the U.S. and abroad, set against the high nonresidential building activity, has brought shortages of fabricated structural steel, reinforcing bars and mesh, and prestressed concrete steel strand.

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Mini-Subs Aid Energy Search Along Continental Shelves

The petroleum industry, spurred by the energy crisis into searching for oil in deeper waters farther offshore, is making expanded use of manned commercial submarines manufactured in the United States.

Other industries, prompted by shortages of materials as their land-based sources are played out, may soon be following suit.

Used primarily for observation and inspection, the mini-subs are working at depths impossible for surface-supported divers alone to conquer.

In the North Sea and many other petroleum-rich areas, visibility is limited. Currents are strong and the water is cold. Under such adverse conditions, divers are at a disadvantage. With a submarine, however, an observer-engineer, seated comfortably within the sub at surface atmosphere, can directly observe the divers' performance.

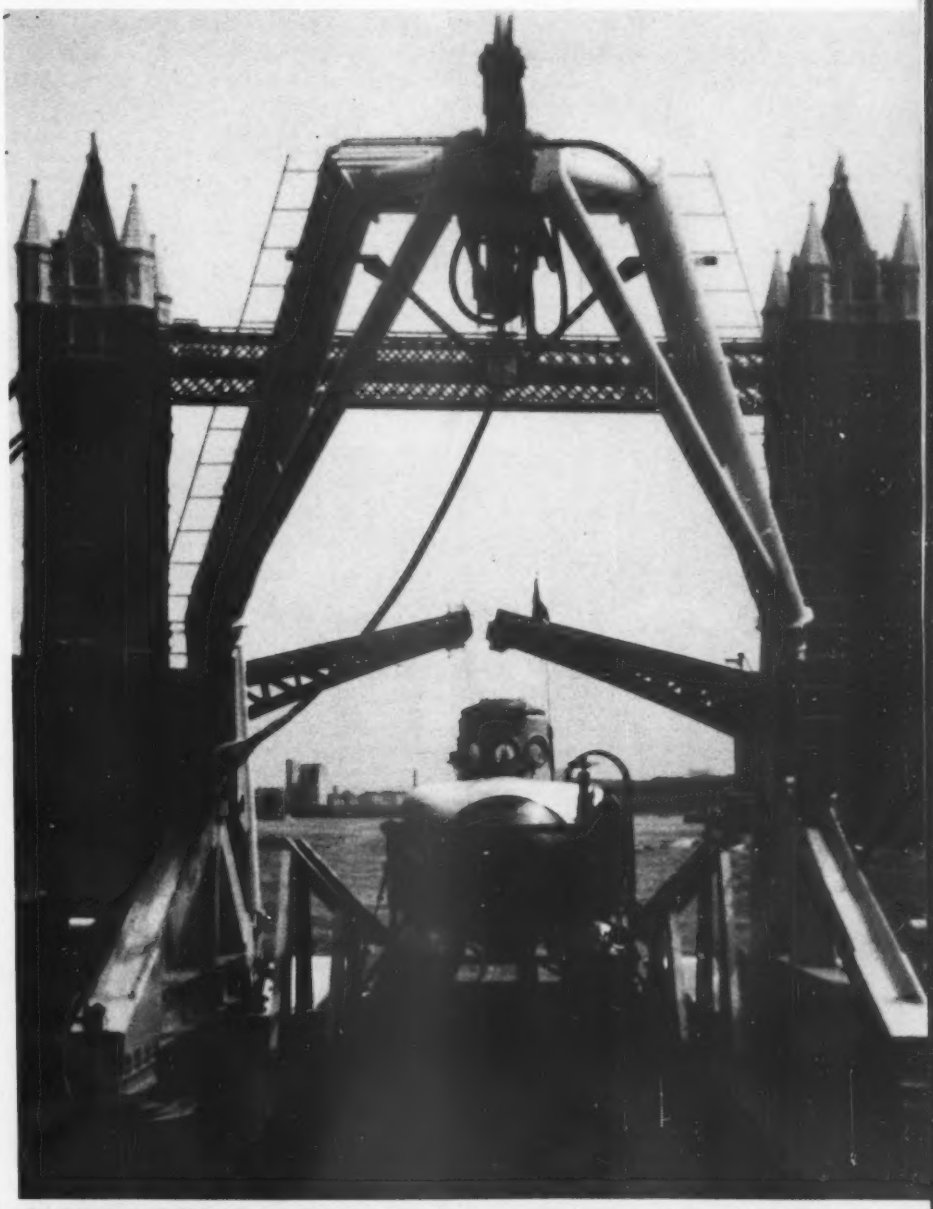
The observer can document the performance on videotape and relay comments to support-personnel on the surface. He also can communicate directly with the divers through umbilicals.

Since the advent of the world energy crisis, business has boomed so much for small submarines that a major U.S. manufacturer, Perry Oceanographics, of Riviera Beach, Fla., will shortly have eight Perry-made subs in the North Sea. The firm has more than doubled its production capacity for subs, diving systems and special ocean equipment and has expanded its product line to include submarines with depth capability of 3,000 feet and more.

Gain acceptance

No longer are these subs looked upon as scientific and experimental curiosities. Innovations pioneered in the U.S. have given them true workboat status. These innovations include high-visibility acrylic noses, modular construction of easily interchangeable components, sophisticated mechanical arms and capability to "lock out" divers in the open water and provide them with umbilical life support.

Two of the newest on the scene in the stormy North Sea are owned and operated by Northern Offshore Limited and Sub Sea



WHERE THE ACTION IS—*A U.S.-made submarine moves down the Thames aboard a support ship, headed for offshore oil missions in the North Sea.*

AVAILABLE ON SHORT NOTICE—*This submarine, needed in a hurry, was airlifted to its Atlantic operating area off the Virgin Islands.*

WELCOME REFUGE—*Submarines and these Coast Guard divers work as a team, even in Arctic waters. Some of the mini-subs can "lock out" divers on the sea bottom, allowing them to perform their tasks while on life-supporting umbilicals attached to the sub.*

Oil Services, S.p.A., a Shell International subsidiary.

The Sub Sea vehicle is operational down to 1,200 feet. She will be used in conjunction with development and operation of Phoenix 66, a seven-man submersible which Sub Sea uses to service underwater wellheads and flowlines, and for salvage. Phoenix 66, with a 400-mile cruise radius and a depth capability of 1,200 feet, can remain submerged for seven days, with its personnel workspace either wet or dry.

Also busy in North Sea operations is Brown & Root's Survey Sub 1, which was built to specifications of the Texas firm. She initially was on duty in the Persian Gulf, where on one job the sub inspected 55 miles of pipeline in ten days. The submarine is being operated by Taylor Diving & Salvage Co., a U.S. company which constructed a specialized support ship in New Orleans to handle the sub.

Another veteran submersible is also on offshore assignment. Shelf Diver, a diver-lockout vehicle, has seen service from the Gulf of Mexico to the Bay of Biscay.

Besides the North Sea, other areas of the world ocean also are being explored by workboat submarines. In the Gulf of Mexico, for example, Texas A & M University is using the "Diaphus," a two-man sub, to investigate natural oil seeps on the Gulf floor.

Bruce C. Gilman, executive vice-president of Perry, emphasizes that submarines are competitive with advertised costs for divers, especially at depths below 120 feet. At shallower depths, actual costs are more or less a trade-off.

"At any depth," he says, "the submarine has obvious advantages. For instance, it can perform heavier tasks and deliver greater loads than the diver.

"It can work in stronger currents and for longer periods. It can carry to the site 70-millimeter cameras, videotape equipment, lights, sensors, magnetometers and water sampling equipment which, if divers were used, would at least require multiple dives.

"Submarines with waterjet gear can help bury cable and piping rapidly and precisely.

"The safety factor is high. In event of power failure, independent onboard air can blow ballast tanks to give positive buoyancy. Batteries, manipulators and anchors can be jettisoned. Pingers can give sonic direction to surface support vessels.

"Unlike the pay structure with divers, submarine costs do not vary with depths involved. Savings thus can be impressive."

The first Perry submarine to handle an offshore petroleum assignment was the Shelf Diver, in May 1969, when it inspected a Tenneco offshore oil storage tank in the Gulf of Mexico.

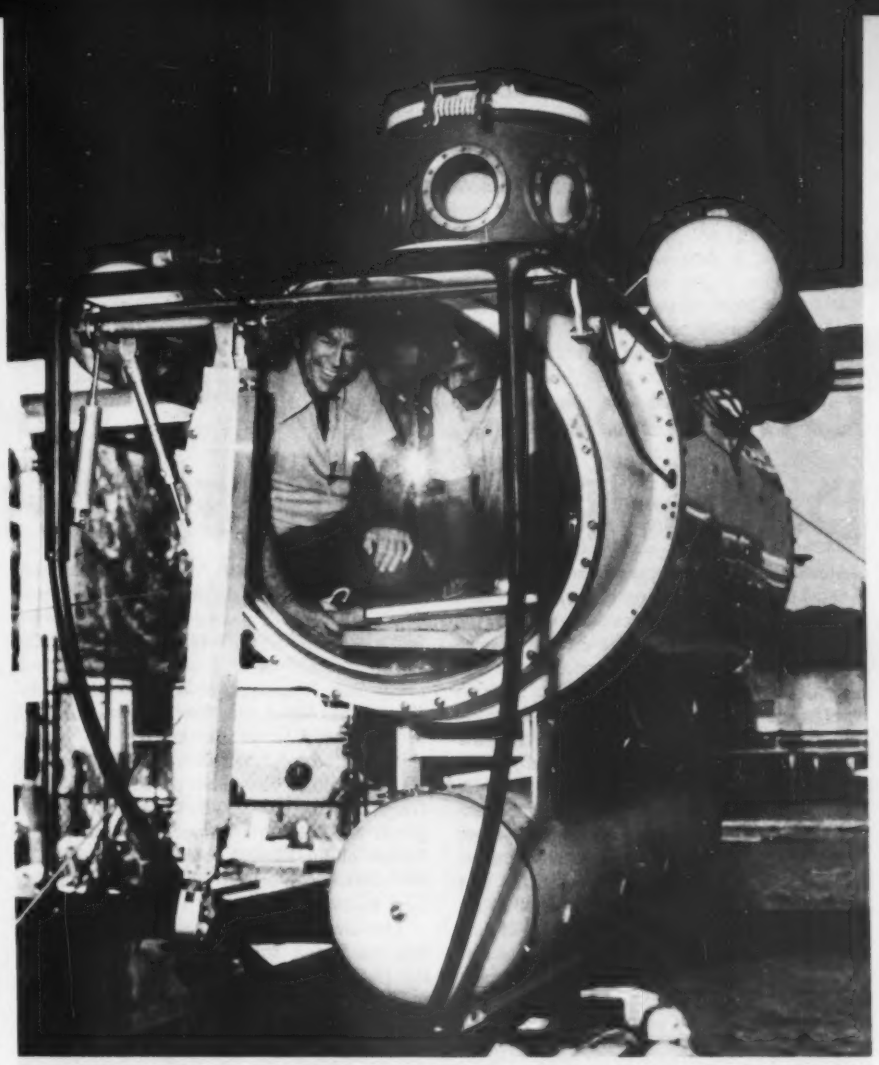
Eases divers' task

Diving in deep water with this sub is very advantageous to the diver, as he is not isolated from the surface. He can always return to the sub for additional breathing supply, or in case of accident would not be stranded below the surface, where he would have to take decompression before returning.

A diver can give more attention to the job he is doing and not have to worry about two or three hundred feet of hose strung out above his head. In case of loss of communication, he can simply follow his hose back to the sub and terminate the dive. The sub can also be a big help in divers locating pipeline in deep water.

Some months ago, in the Bay of Biscay, Shelf Diver helped recover an experimental oscillating platform — actually a mobile storage tank — for towing to shore. The platform, 400 feet high from base to tip and 40 feet in diameter, was in 325 feet of water. The operation involved using the submarine and a team of divers to inspect the platform, disconnect it from its universal joint base plate, tip the platform over to horizontal (a process known as "debasculating"), and towing the platform to a port 125 miles away.

In Southern France, Shelf Diver was used to inspect the inside of a 15-foot diameter conduit carrying fresh water from the French Alps to Marseilles. At one point the sub was beneath a 1,000-foot mountain and a mile inside the pipe. She bumped the sides of the pipe during entry and exit—she had to back her way out—but emerged virtually unscratched.



CLEAR AS A BELL—*Excellent visibility through the nose is a feature of this submarine being used by Texas A&M University to investigate natural oil seeps in the Gulf of Mexico. Inside are inventor John H. Perry, Jr. (l.), and Dr. Thomas Bright of Texas A&M.*

Tethered submersibles are among equipment being used with sophisticated seabed petroleum installations—installations which many experts feel will revolutionize the industry's deep-water ventures and eliminate surface platforms.

Perry, for instance, built a one-atmosphere personnel transfer bell, with limited self-positioning, for a subsea system in the Gulf of Mexico; another bell, by Lockheed, is in use with a Shell wellhead cellar, also in the Gulf.

A tethered submersible, OPSUB, is owned by Ocean Systems, of Reston, Va., and leased to Phillips Petroleum for use in the North Sea. Operational down to 2,000 feet, the sub serves on subsea observation and inspection missions, providing close-up television transmission to observers stationed on the surface support boat.

Over the years, offshore industry has put submarines of General Oceanographics, a California firm, to a variety of uses. Since 1968, their subs have successfully completed more than 1,300 dives on such projects as seafloor pipeline surveys off Gibraltar; pipeline, outfall and platform inspection in Victoria, British Columbia, the Santa Barbara Channel, and Lake Michigan; salvaging of sunken objects; rescue of the submersible Deep Quest, and geological mapping and sampling.

On the drawing board is a sub that could be used for seismic oil and gas exploration beneath the Arctic ice. The 9,400-pound vehicle would include features never before used on submarines. A hinged transparent nose would enable personnel to easily service the sub's equipment. Nickel cadmium batteries would give her a 15-mile operating range.

The needs of offshore industry will increase as deeper depths are probed. U.S.-made submarines, it appears, will help satisfy those needs.

Oil Imports Tilt U.S. Trade Stance; Deficit Posted In First Half Of 1974

Intense inflationary pressures around the world and skyrocketing oil prices boosted U.S. foreign trade values sharply in the first half of this year. Price advances were especially steep for imports under the impact of a four-fold increase in the cost of foreign petroleum. The resulting huge oil import bill was the major reason for the shift in the trade balance into a deficit position from the surplus recorded in 1973.

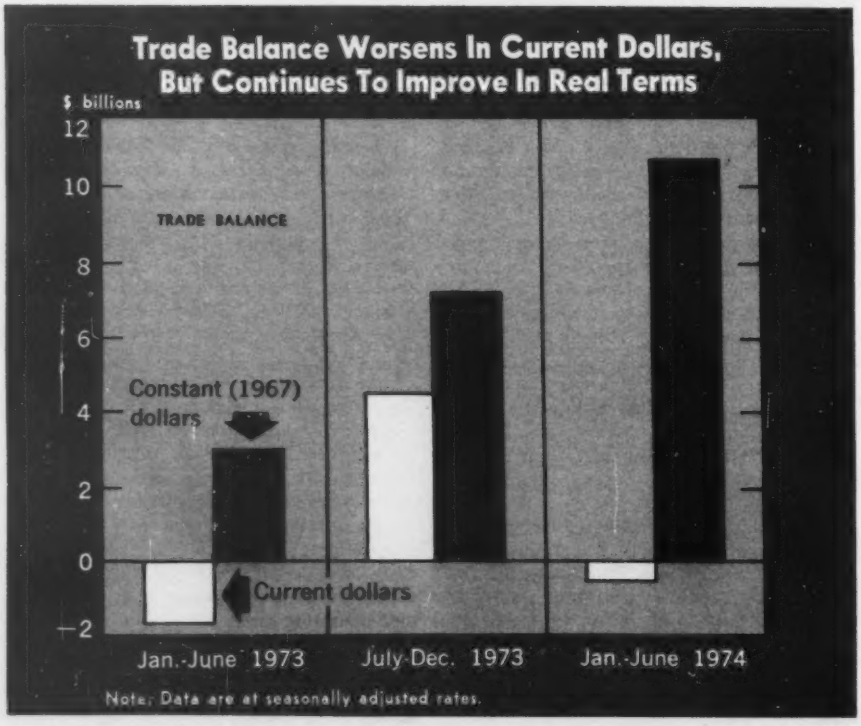
Measured in current dollars, U.S. exports, excluding military grant-aid, were running at a seasonally adjusted annual rate of $93.2 billion in the first half of this year, 32 percent greater than in all of 1973. Compared with the first six months of last year, the export gain was 45 percent. Imports jumped to $93.7 billion, 35 percent above last year's total and 42 percent higher than in January-June 1973. The merchandise trade balance slipped into a deficit of $509 million at a yearly rate, after registering a surplus of $1.3 billion in 1973. The negative shift in our trade position was even more apparent compared with July-December, when the surplus was running at a $4.6 billion annual rate.

Measured on the basis of c.i.f. values, which include the cost of insurance and freight incurred in transporting foreign goods to U.S. ports, imports totaled $100.4 billion at an annual rate in January-June. The deficit calculated using this figure was $7.2 billion.

The steep rise in prices so far this year has masked a substantial improvement in the U.S. trade position in terms of volume as imports declined and exports continued to advance, albeit at a reduced rate. Following an increase of 6 percent in 1973 in terms of constant (1967) dollars, imports dropped 3 percent in January-June, while the export expansion decelerated from 23 percent to 9 percent.

The reduced buoyancy of U.S. foreign trade movements this year was principally associated with the substantial slowdown in worldwide economic activity. Export growth was retarded by the softening demand overseas as the foreign business cycle moved into the downswing phase and restrictive economic policies were implemented in a number of countries to curb severe inflationary pressures and to cope with energy shortages. The gains that were recorded in sales abroad reflected deliveries on orders placed earlier, tight supplies of many key commodities, and the improved competitive position of the U.S. dollar.

The weakness in U.S. import demand, evident since early 1973 and continuing through the first half of this year, was the result of much slower business activity in this country during the period, particularly at the height of the energy crisis when real output fell sharply. Imports were also retarded by the rise in prices of foreign goods following the currency realignments of the past three years.



Nonfarm shipments advance

Exports of nonagricultural products continued to expand in the first half of the year. These shipments rose 44 percent from the same period of 1973 to $35.1 billion; from July-December the advance was 22 percent. Machinery sales remained on a strong uptrend, accounting for a sizable portion of the nonfarm export increase. In general, the strong rise in machinery shipments—despite the weakening in industrial output and investment overseas—can be attributed to continued foreign demand for the high quality, technologically sophisticated equipment in which U.S. manufacturers compete most successfully, the price advantage gained in many markets as a result of the currency shifts, and

Most major nonfarm exports post large gains

	1973		1974
	1st half	2nd half	1st half
	Millions of dollars, seasonally adjusted		
Nonagricultural products, total	24,350	28,724	35,064
Machinery	7,915	9,272	10,838
Motor vehicles and parts	2,909	3,100	3,546
Civilian aircraft	1,029	1,324	1,580
Chemicals	2,561	3,199	4,195
Iron and steel	541	716	1,115
Textile yarns and fabrics	515	707	944
Coal	474	537	837
Logs and lumber	631	665	668
Paper	343	394	550
Woodpulp	224	261	460
Iron and steel scrap	284	309	424

a large foreign order backlog. Higher prices added to the gain in value.

Deliveries of computers and parts rose $1.1 billion in the first half. Following a sharp expansion in the final six months of last year, shipments of engines and agricultural machinery each scored substantial gains with exports to Canada accounting for a large portion of these increases. Deliveries of tubes, transistors, and semiconductors surged upward, reflecting limited availabilities and strong worldwide demand for electronic components. A large proportion of these shipments were to U.S.-owned plants in Mexico, Singapore, Korea, Taiwan, and Hong Kong. Deliveries of radio and television apparatus accounted for most of the rise in telecommunications equipment exports.

As foreign airlines continued to expand and modernize their fleets, sales of both jumbo jets and smaller passenger transports posted substantial gains Shipments of aircraft parts and military planes were also buoyant. Exports of automotive products to Canada advanced after showing little growth in July-December, when parts outflows were held down because of work stoppages at Canadian plants.

Sales of most industrial materials surged, with higher prices accounting for much of the rise in value. After sharp gains in both halves of 1973, chemical deliveries expanded by one-third in January-June. Shipments of organic chemicals were especially buoyant reflecting shortages in certain product lines and much higher prices. Exports of plastic materials to Canada and the American Republics recorded huge advances. After climbing sharply in July-December, deliveries of manufactured fertilizers rose only moderately in value despite soaring prices. Tight supplies and heavy domestic needs reduced availabilities for export, causing the quantity shipped abroad to decline.

Steel shipments posted a gain of nearly three-fifths as foreign demand continued heavy and supplies from competing sources were limited. Most of the increase went to Canada and Brazil. Coal exports to Japan also advanced strongly, but exports of steel scrap, limited by quotas imposed in mid-1973, declined in quantity compared with the first half of last year, though sharply higher prices lifted the value of shipments. Paper deliveries posted a huge increase as a result of worldwide shortages and higher prices. Exports of logs and lumber, after declining in last year's second half, showed little change from these levels in January-June. Voluntary limits on purchases by buyers in Japan and reduced construction activity in that country accounted for these developments.

Prices boost farm exports

The value of U.S. agricultural exports recorded a huge advance in July-December 1973 and rose further in the first six months of this year, to $11.5 billion. In terms of volume, the trend was in the opposite direction, however, as quantities dropped in both half-year periods. Although price increases were still substantial this year, an easing of inflationary pressure was noted, reflecting some improvement in world availabilities of farm products.

Deliveries of soybeans, which had declined in the final half of last year because of extremely tight supplies and export controls, bounced back strongly. These sales climbed by one-third from first half 1973 levels and exceeded the July-December total by 64 percent. Sales of corn also expanded sharply again, principally to Western Europe and Japan. After little growth in the last half of 1973, cotton deliveries, especially to the People's Republic of China, recorded a very large advance. On the other hand, wheat shipments declined in quantity from either half of last year, although the value was greater than in January-June 1973 because of much higher prices. A reduction in sales to the USSR was the principal factor in holding down the volume of wheat exports.

Huge oil bill swells imports

The trend in U.S. imports in the first half of 1974 was dominated by a spectacular jump in the value of petroleum arrivals. In terms of value, oil imports have accounted for about one-fourth of our purchases from abroad so far this year, and nearly 60 percent of the increase from the same period in 1973. Receipts of petroleum climbed to $11.1 billion compared with only $3.1 billion in the first half of last year, despite a slightly lower volume, as the average unit value of these imports jumped to $10.45 per barrel from $2.86.

Though oil imports registered the most striking increase in the first half, other industrial supplies also rose significantly. Including petroleum, industrial supplies imports totaled $22.7 billion, an advance of 85 percent over January-June 1973 levels. Compared with the final half of last year, the rise was about three-fifths. Much of the growth in imports of non-oil industrial supplies also reflected price increases as worldwide shortages of some commodities persisted despite the general slowdown in economic activity.

After declining slightly between the first and second halves of 1973, the value of imported iron and steel-mill products surged upward as prices rose. Although steel demand remained relatively strong in this country, the tightness of supplies abroad has limited availabilities for shipment here, leading to a drop in import quantities from levels in either half of last year. Higher

Prices boost farm export values; wheat drops in volume, others gain less rapidly

	January-June 1974		Percent change from Jan.-June 1973	
	Value	Quantity	Value	Quantity
	$ millions			
Corn (mil. bu.)	2,055	692	+80	+12
Soybeans (mil. bu.)	1,980	307	+35	+12
Wheat (mil. bu.)	1,915	390	+36	−41
Cotton (thous. bales)	899	3,616	+68	+ 6
Soybean oilcake and meal (thous. sh. tons)	594	3,116	+29	+ 9

Volume of industrial supplies, consumer goods imports falls, but higher prices raise values

	1973		1974	Percent change from	
	1st half	2nd half	1st half	1st half	2nd half
	$ millions, seasonally adjusted				
Industrial supplies					
Current dollars	12,280	14,268	22,702	+85	+59
Constant (1967) dollars	9,665	9,502	8,924	− 8	− 6
Nonautomotive consumer goods					
Current dollars	6,392	6,708	7,013	+10	+ 5
Constant (1967) dollars	4,615	4,386	4,104	−11	− 6
Capital goods, excl. automotive					
Current dollars	3,548	3,992	4,479	+26	+12
Constant (1967) dollars	2,687	2,902	3,131	+17	+ 8
Automotive vehicles, parts, and engines					
Current dollars	5,372	5,458	6,081	+13	+11
Constant (1967) dollars	3,361	3,160	3,582	+ 7	+13
Foods, feeds, and beverages					
Current dollars	4,369	4,699	5,508	+26	+17
Constant (1967) dollars	3,066	2,864	3,092	+ 1	+ 8

prices, strong demand, and strike-hedge inventory building were the major factors behind the big surge in copper entries in the first half. Arrivals of newsprint, after declining in last year's second half because of strikes in Canada, rebounded strongly. Lumber imports dropped in both value and quantity, however, reflecting the slump in U.S. housing construction since early 1973.

Slower consumer goods entries

In contrast to the buoyancy of industrial supplies imports, purchases of consumer goods, after slowing markedly in last year's second half, decelerated further in January-June. At $12.4 billion, these arrivals exceeded first half 1973 levels by 11 percent and topped the final six months' total by just 7 percent. Moreover, the increase was due to higher prices as entries of consumer goods declined in volume terms. The share of consumer goods imports (excluding Canadian automotive products) to U.S. personal consumption expenditures on goods stood at 7.2 percent in the first half, significantly higher than the 1973 ratio. The sluggishness in these imports was related mainly to the slackening in spending by U.S. consumers and the demand-dampening effects of higher foreign prices.

Arrivals of autos and parts from Canada fell in July-December 1973 and dipped further this year. Most of the drop reflected lower deliveries of parts to plants here as U.S. car production declined steeply. Receipts of assembled vehicles from Canada managed a small rise over July-December, but remained below levels reached in the first six months of 1973.

Conversely, imports of foreign-made automobiles recorded a sharp expansion. As in the previous year, much of the value reflected price hikes by foreign manufacturers and relatively greater imports of the larger more luxurious models. There was also a substantial increase in the volume of foreign car receipts, however, despite a much lower level of sales, with the result that huge inventories had been built up by mid-year. Entries of radios, television sets, clothing, and footwear changed little from 1973 levels. After climbing relatively sharply in July-December, purchases of motorcycles leveled off.

Imports of capital goods continued to climb, but at a slower rate than last year. At $5.2 billion, these entries recorded a 13 percent advance over July-December 1973 levels and exceeded the first half total by one-fourth. As a share of U.S. spending on producers' durable equipment, imports of capital goods (excluding trucks) accounted for about 12 percent up from 11.4 percent in 1973. Machinery arrivals, led by telecommunications apparatus and semiconductor devices and parts, contributed most to the advance. Entries of trucks from U.S. subsidiaries in Canada continued to rise in value.

Food imports buoyant

Purchases of foods and beverages rose to $5.5 billion, one-fourth greater than in the comparable period of 1973, and 17 percent above second half levels. Higher prices accounted for most of this year's increase. Food imports comprised 6 percent of U.S. consumers' expenditures on food and beverages, compared to 5.5 percent in 1973. Coffee and sugar receipts climbed sharply as world supplies of both commodities remained limited and prices rose. A big increase in dairy product arrivals reflected larger import quotas for cheese and dried milk.

Area trade

The U.S. trade position with both Western Europe and Japan improved further in January-June 1974 as exports to these areas rose vigorously, outpacing increases in imports. The trade deficit with Canada narrowed in comparison to January-June 1973, but was slightly higher than in the second half, reflecting greater imports of more expensive petroleum and other industrial supplies.

The U.S. trade position vis-a-vis the developing areas was strongly affected by the increase in petroleum prices. As the values of imports from oil producing countries tripled over their level in the comparable 1973 period, the trade balance with this group of nations moved into a huge deficit position. On the other hand, exports to the other developing countries climbed considerably faster than imports, resulting in a large positive balance.

The surplus in U.S. trade with the Socialist countries in both halves of 1973 was reduced in January-June, primarily because of a falloff in grain exports to the USSR.

Soviets List Projects For U.S. Participation

Reiterating their interest in U.S. participation in new production facilities for ferroalloys, alumina and auminum, graphite electrodes and crystalline silicon, Soviet trade authorities are now estimating that the imported equipment and technology components they seek for such projects would be in excess of $1.8 billion.

The projects were introduced by the Soviet delegation to the Fourth Session of the Joint U.S.-USSR Commercial Commission, held in Washington earlier this year. The projects are linked in that all of them are energy-intensive, requiring major amounts of electrical power.

The ferroalloy projects have the goal of new production of 1.2 million metric tons of ferromanganese annually, and 320,000 metric tons of ferrochromium. Imported equipment costs could exceed $225 million.

Two aluminum complexes are also planned, producing alumina, aluminum, and rolled products. Two rolling mills would have an annual production capacity of 500,000 metric tons each. Imported equipment and technology costs for both complexes are estimated at $1.4 billion.

A 100,000 metric ton graphite electrode plant, the output of which would be used in large steel smelters, could use imported equipment exceeding $200 million. The Soviet delegation expressed interest in U.S. participation in a 60,000 metric ton crystalline silicon plant that could use imported components valued at $34 million.

Background information on Soviet plans for these, and other energy-intensive projects, is available from the Bureau of East-West Trade's, Trade Development Assistance Division, phone 202-967-2885.

Environmental Theme Draws Throngs To Spokane's Expo '74

The halfway mark is hardly the time to announce the resounding success of an international exposition, but in the case of Spokane's Expo '74 the temptation is very strong.

At the midway point of "The International Exposition on the Environment," as the exhibit is officially called, more than three million visitors had passed through the gates. Total expected attendance when the event opened was 4.6 million. "The figures have been in excess of expectations right along," says Commerce's Jim Brennan, who is Deputy Director for Operations of the U.S. Pavilion Staff for Expo '74. "In earlier exhibits, attendance would often start off with a rush but taper off after the first couple of weeks. At Spokane there has been no letdown."

To prevent any second half letdown, especially in the post-Labor Day period when families with school-age children are out of the vacation market, Expo officials have planned a heavy schedule of special crowd-pleasing events.

Continually changing

Pan for gold, dine in an authentic Russian restaurant, camp out with Indians or visit a ghost town . . . take part in an environmental symposia series . . . ride the mailboat up the roaring Snake River, or fish for a world's record Kamloops trout. Or take in a performance of the London Ballet. You can do it all at the Expo '74 World's Fair in Spokane—the only world's fair that will be held in North America in this decade.

The fair also offers a continually changing assortment of free entertainment featuring local singing groups, high school bands, square and folk dance troups—including several from foreign countries—folk singers and special entertainment groups from all over the United States and Canada.

A sampling of attractions scheduled for the latter part of the show includes: The Osmonds, John Denver, Margot Fonteyn and the London Ballet, an exhibition football game between the New England Patriots and the Denver Broncos, games beween the USSR's world championship basketball team and a team of U.S. college all-stars, singer Helen Reddy, a special show on Polynesia, the National Chinese Opera Theater (Republic of China), the Utah

WHERE IT'S AT—*Housed on two islands in the middle of the Spokane River, Expo '74 had hosted more than three million visitors at its early August midpoint. The U.S. Pavilion is the large building at the center. Keyed to man's relationship to his environment, Expo's fairgrounds themselves were "reclaimed," having previously housed some rundown warehouses. The exposition will run until Nov. 3*

THE MESSAGE—*U.S. pavilion's exhibits include a display of solid wastes that are suitable for recycling and subsequent reuse (l.) and a grasshopper, housefly and snout beetle hovering over the pesticides display (r.) The exhibit points out that sometimes a pesticide's effect can be worse than the damage caused by the pest it's designed to remove, and calls for restraint in their development and use,*

Symphony, a symposium on environmental law, the USSR's spectacular Moiseyev Dance Company, the Royal Canadian Mounted Police Musical Ride, and barbershop harmony weekend.

Seven of the nine national pavilions will hold their "National Days" during the second half of the show, according to U.S. Commissioner General Claude Bekins. "These are big days for attendance," he says. Australia, Canada, the Philippines, South Korea, Taiwan, the Soviet Union and West Germany all slated their National Days for the second half of the exhibit.

"Leading government officials and celebrities are brought in and special attractions are planned, as each country tries to outdo the others," Bekins reports. "When the Russian gymnasts made a six-day appearance earlier in the show, there wasn't a vacant seat in the house."

But Expo '74 is much more than hoopla. The following excerpts from a speech prepared for delivery by Interior Secretary Rogers C. B. Morton at the U.S. Environmental Statement Day ceremonies on Aug. 15 help illustrate what Expo '74 is all about:

"We know that the production and use of almost all forms of energy available to us at the present time entail environmental costs or risks of one kind or another. So the answers are not easy. Some of them are costly. But we must all be prepared to bear those costs.

"One of the very best answers is energy conservation. The conservation programs which we launched in the dark days of last winter must be made a permanent part of our daily lives. The lifting of the oil embargo is no license to return to our wasteful ways of the past.

"Energy conservation is simply another name for environmental preservation. Every time we turn off a light, save a gallon of gasoline, or cut down on the use of hot water, we also help to preserve our precious environmental resources. We have to remember that when we reduce our auto speed from 65 to 55, we're going to breathe purer air. We're also more likely to arrive at our destination safely, too. The lowered speed limits have resulted in a significant reduction in traffic fatalities. About 1,000 lives have been saved each month since October 1973.

"Not only does energy conservation make environmental sense, it also makes economic sense. This applies to business as well as the consumer. Businessmen have learned that improved efficiency in the use of energy can effect substantial savings in their operations. And many firms, from the retail shop on the corner to our largest industrial complexes, have energy conservation programs under way that are proving highly successful.

"But we know that in some cases where environmental considerations conflict with other needs and values of society, we have no alternative but to arrive at reasonable compromises. This doesn't mean that we are changing our unalterable course to improve the environment. And it doesn't mean that we are retreating or giving up the fight.

"It does mean stretching out the timetable in some cases. It does mean adjusting some of our long-range goals to accommodate the needs of the immediate present. It does mean some trade-offs.

"The zero growth argument says we can't have a clean, healthy environment—and continue to expand at the same time. It claims that we are exhausting all resources, including the environment.

FOURTH OF JULY ALL SUMMER—*There's a constant feeling of carnival in the air at Spokane, but the message with which a Suquamish indian chief rebuffed the Federal Government's offer to buy his tribe's land points up the serious nature of the exhibit.*

"But it fails to take into consideration the one inexhaustible resource: man's creative ability.

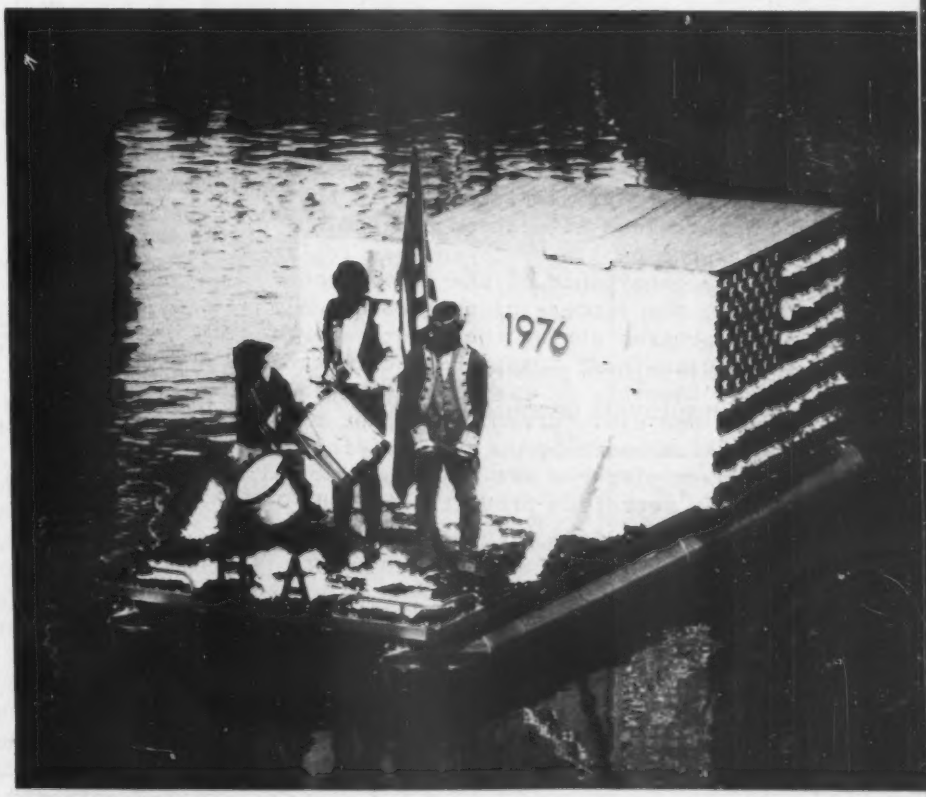
"We not only dream of a better world; we are endowed with the capacity to create that world. We invent, we discover, and build to turn our dream world into reality.

"Our creative resources are not only inexhaustible, they grow every day. As far as we can tell, the frontier of creative scientific knowledge is limitless. So who can doubt that we have the capacity to make the scientific and technological advances required to build our new dream of fresh air, pure water and an undefiled countryside—while at the same time continuing an orderly economic expansion; including more employment opportunities?

"Our presence here today is evidence that our people have joined together to achieve a clean, healthy environment and the orderly economic expansion that must accompany this effort.

"Our presence also helps to rekindle the American spirit of cooperation and the individual responsibility on which it is based.

"That spirit, once mobilized and on the move, is the most powerful force in this country. We have felt its power in war and in peace, in good times and bad. It has never let us down—and no matter what challenges we may face in the future, let us put our faith in our readiness as a free people to join together in common purpose and understanding, to achieve our goal of a better life for all our people."



TOP ENDORSEMENTS—*Not only is Expo '74 the only World's Fair authorized to take place in the Northern Hemisphere during the decade of the 1970s, but it has also been designated as an official Bicentennial event in observance of the country's upcoming 200th birthday.*

Energy Management Digest

DOMESTIC REFINERIES RISING...More oil companies are building new refineries and expanding existing refinery capacity in the United States as the result of changes made last year in U.S. oil import policy, according to the Federal Energy Administration. The FEA publication, "Trends in Refinery Capacity and Utilization," traces the development of new refining capacity in the U.S. and compares this with capacities in the Caribbean, the Middle East, and other world refining export centers. The report shows, for example, that projected new refinery capacity in the Caribbean for 1971-75 is only 70 percent of that projected in an earlier study. By contrast, new U.S. refinery capacity as projected in 1972 was virtually zero, while a current projection sees an added capacity of about three million barrels per day by the end of 1977. Copies of the report may be obtained from the FEA Public Affairs Office, U.S. Post Office Building, Ben Franklin Station, Washington, D.C., 20461.

STATES' ROLE RECOGNIZED...The Federal Energy Administration has announced that checks totaling $5 million have been mailed to the nation's 50 states and territories, to partially reimburse them for expenses incurred through their participation in the Mandatory Petroleum Allocation Program. "I don't think the public has been made fully aware of the importance of the states' contribution to the success of the petroleum allocation program during the severe shortages this past winter," said FEA Administrator John C. Sawhill. In fiscal 1974, state governments and U.S. territories spent millions of dollars setting up and staffing offices to administer a set-aside program for allocated petroleum products for thousands of hardship cases across the country.

ALLOCATION SEEN UNNECESSARY...While acknowledging shortages of some materials essential to increased energy production, FEA Administrator Sawhill says allocation of these materials would be unwise at this time. "There are limits to what can be accomplished through any system for allocating scarce materials. The basic need is for industrial expansion. No new supplies are created by allocation. Supplies are just rearranged, which could cause dislocations in other sectors of the economy."

SUPPLY OF SMALL CARS RISING...The domestic inventory of small cars is increasing as the supply of standard sizes is reduced. As of June 1, small cars amounted to 35 percent of a total inventory of 1.6 million unsold cars. On February 1, small cars were 20 percent of the total. Increased production facilities plus the failure of domestic small car sales to achieve anticipated levels because of the energy crisis last winter led to increased inventories of the small cars. Inventories of imported cars are rising and the May 31 level of 500,000 is at record levels.

CUTTING HOUSEHOLD BILLS...Washing clothes in cold water with cold water detergents could cut as much as four percent from the household's gas or electric bills according to the Federal Energy Administration. If everyone in the country stopped laundering in hot water, the national fuel saving would amount to 160,000 barrels of oil per day, FEA says. Also, manual refrigerators and freezers use only about two-thirds as much energy as the frost-free type. Energy consumption in cooking can also be reduced by using pans that entirely cover the heating element, so that more heat enters the pot and less is lost to the surrounding air. Pots should be covered whenever possible.

SMALL FIRMS AIDED...Secretary of Commerce Frederick B. Dent has announced a $60,500 grant for a program to help small businesses in Michigan conserve energy. The program will help small firms, lacking technical expertise to decrease fuel costs and maintain productivity in the face of energy problems. It will be conducted by the Office of Economic Expansion of the Michigan State Department of Commerce in Lansing, and will include special studies on heat control and steam applications in small plants, as well as studies of the maintenance of combustion equipment and air and cooling systems. The project also will consider alternate sources of fuel and methods of conserving energy in various production processes. Information gathered during the program will serve as the basis for a consumer guide to industrial energy conservation.

Whole Nation Pitching In To Resolve Penny Shortage

An energetic campaign throughout the country to return pennies to circulation is showing increasing results.

Enlisted in the campaign are large numbers and conditions of people, ranging from leading bankers and industrialists to small children who turn in their precious piggy banks. If the campaign progresses as hoped, the prospect is that the penny crisis will not reach the point where it will become necessary to design and mint a new penny containing less copper.

The goal of Mrs. Mary Brooks, Director of the Mint, is to bring three to ten billion pennies back into circulation. She explains that every billion pennies lured out of hiding would save American taxpayers $10 million. Thus, three billion pennies coaxed back into the financial mainstream would mean a saving of $30 billion, and ten billion would conserve $100 million.

The penny problem is one of those baffling, unexplainable things that, from the viewpoint of the U.S. Treasury, makes no sense whatever.

Mrs. Brooks points out that 65 billion pennies have been minted in the last 15½ years of one design, the familiar Lincoln head, which if poured into one pile would weigh well over two million tons. Of this vast penny stock, an estimated 30 billion pennies are in hiding, or more than 140 pennies for every man, woman, and child in the country. This number of pennies would weigh almost a pound per person.

What on earth would every person in the country be doing with a pound of pennies? Mrs. Brooks comments that the Lincoln penny obviously has no numismatic or coin-collection value. To some extent pennies are included in manufactured novelty items, such as bookends, paperweights, ashtrays, jewelry, and even toilet seats. But not all the missing pennies are in these things, or in piggy banks. A substantial quantity of pennies is being hoarded.

The fluctuating price of copper apparently has inspired the hoarding. But, as Mrs. Brooks explains, the price of copper dropped recently. The penny is 95 percent copper. But the recent price of copper would have to double almost before the copper content of a pound of pennies would be worth what the pennies are anyhow.

There are other impediments to reaping a profit by melting pennies for sale as copper. For one thing, it is illegal. For another, it requires expensive equipment.

Thus, there is no shortage of pennies, only an inadequate supply of pennies in circulation to meet the demands of trade. To help meet the demand, the Mint is producing 35 million pennies a day, almost twice as many as a year ago.

In late July, 25 officials of mass merchandising stores, supermarkets, and fast-food chains in a meeting with government officials launched a national business campaign to keep pennies in circulation. Helping to arrange the meeting and participating in it were John P. Kearney, Commerce's Ombudsman for Business, and Charles Daly, of the Office of Business Assistance and Ombudsman for Business. Also participating were Treasury officials, the Federal Reserve Board, the Comptroller of the Currency and representatives of national banks, and the American Bankers Association.

National campaign planned

Mrs. Brooks said the effort is receiving "tremendous cooperation on the part of the big retailers," and that she hoped to have a national program going well on into the fall in the attempt to bring the missing pennies out of their hiding places. In view of the encouraging response, she added, she is hopeful that the campaign can be expanded sufficiently to relieve the pressure on the supply of copper and possibly help the effort to curb inflation. This would involve the cooperation of public relations organizations and the Advertising Council, and presentation on television and radio.

"It is really remarkable to have the country so responsive," Mrs. Brooks said.

Arthur F. Burns, Chairman of the Board of Governors of the Federal Reserve System, has written to all the nation's commercial banks asking them to assist in getting pennies back into circulation and to call on their customers and members of the public to recirculate their coins.

Burns pointed out that previous increases in the price of copper and legislative proposals to change the alloy of pennies had caused speculation and hoarding.

He appealed to banks to accept deposits of loose pennies and said that production by the Mint of vast quantities of pennies to replace those removed from circulation is "incurring unnecessary government expenditures."

Rex J. Mortland, Selma, Alabama, President of the American Bankers Association, in a letter to the chief executive officers of member banks, has asked them to join in the nationwide effort to return pennies to circulation.

The Mint, in cooperation with the Federal Reserve and through the banking industry, is offering a special citation certificate to anyone who brings in $5 or more in pennies. The award previously was for persons bringing in $25 or more in pennies. But it was found that few people would want to carry $25 in pennies for any great distance. They would weigh about 17 pounds.

Some enormous amounts have been turned in. Youngsters at one school collected 204,071 pennies. In Detroit, Emmett Sampson dropped into a bank and deposited 20,340 unwrapped pennies, weighing 140 pounds, into his savings account.

Bargains are springing up in numerous places if payment is offered in pennies. A "Roll of Pennies" campaign is bringing results. In one city, a McDonald's restaurant offers a 70 cent Egg McMuffin for a roll of 50 pennies. A radio electronics store in another city offers a dollar bill and a silver quarter for 125 pennies.

Mrs. Brooks hopes the stream of returning pennies will reach flood proportions.

Training Program To Aid Regional Development

A national program to train specialists in multi-county economic development will be assisted by a $111,000 three-quarter grant to the National Association of Development Organizations from Commerce's Economic Development Administration (EDA). The program will encourage adjacent jurisdictions to work together to solve regional problems blocking growth and to create jobs for residents of economically lagging areas.

The association will use the EDA grant to help pay the adminstrative costs of planning and carrying out a series of six management-training seminars for professional staffs of districts and citizens serving as non-paid public members of district organizations.

Citizens' Energy Views Sought In Nationwide Public Forums

A series of ten public meetings to hear the views of private citizens, industry, and government on Project Independence—the blueprint for U.S. self-reliance in energy by the 1980s—began Aug. 6-9 in Denver.

The hearings, each scheduled for three to five days, will be held in the ten Federal Energy Administration regions. Although each meeting will open with a specific topic, the plan calls for general sessions on all aspects of energy policy.

Designed as a total package to be incorporated into the "blueprint" to be presented to the President by November 1, the hearings will be open to all segments of the American public.

"We are particulary interested in hearing citizens' views and opinions at these meetings," Federal Energy Administrator John C. Sawhill stressed. "Self-reliance in energy cannot be solely the province of industry and government.

"The technical creativity that shaped a strong industrial America came not only from corporations, but also from the Wright brothers, the Edisons, and the McCormicks. The inventive mind of the individual American has been the hallmark of our progressive democratic society," Sawhill said.

"The era of cheap, abundant energy is over for America," he stressed. "I urge citizens to put their heads together at these hearings to help decide how we can best meet the energy needs of the 1980s and beyond.

"There are millions of people in this country who are eager to participate in the important decisions being made by the Federal Government in Washington.

"We're bringing these hearings out to the people to give them the opportunity to help make the energy policies which will affect all our lives," Sawhill said.

How to testify

Individuals or groups wishing to testify at one of the Project Independence hearings should write the Federal Energy Administration Regional Office which is sponsoring the hearing they wish to attend.

Written requests to testify should arrive in the appropriate FEA Regional Office at least 10 days in advance of a hearing, and should include name, address, phone number, and subject area to be addressed.

Citizens who can not take time off from work during the day may testify at evening sessions. Citizens who wish to testify but are unable to attend a hearing may submit written testimony up to 10 days after the hearing.

FEA requests that oral testimony be held to approximately 10 minutes per individual (written testimony of any length can be submitted). Upon specific request, more time may be granted and more than one person representing a particular group may speak.

However, to insure that all who wish to testify have the opportunity to do so, FEA urges participants to be concise.

Scheduled meetings, and their specific topics, are:

Aug. 19-22 — New York — Capital requirements for Project Independence; (212-732-5000)

Aug. 26-29—Boston—Definition of U.S. energy independence, emergency measures to deal with import cutoffs, and options for New England; (617-223-5257)

Sept. 5-7—Seattle—Research needs for Project Independence, and Alaskan development; (206-442-7280)

Sept. 9-13 — Chicago — Role of nuclear power and advanced energy systems; (312-353-0538)

Sept. 10-13—Kansas City—Labor, material, construction and transportation needs for Project Independence; (816-374-2931)

Sept. 16-20—Houston—Federal leasing and regulatory policies and the energy industry; (214-749-7345)

Sept. 23-27—Atlanta—Development of the outer continental shelf, superports, and refinery siting; (404-526-4758)

Sept. 30-Oct. 4—Philadelphia—The environment and Project Independence; (215-597-0792)

Oct. 7-10—San Francisco—Strategies for energy conservation—reducing U.S. energy demand (414-556-7145).

Each meeting will open with a discussion of the specific topic listed above, to be followed by general sessions which will cover any points participants wish to raise.

Southern Metro Areas Show Top Income Growth

Nine of the top ten metropolitan areas showing greatest growth of personal income in 1972 are in the South, according to a special issue of the "Survey of Current Business" published by Commerce's Social and Economic Statistics Administration.

The top standard metropolitan statistical areas and their percentage increases are as follows: Killeen-Temple, Tex.—26 percent; Orlando, Fla.—18 percent; Gainesville, Fla.—17 percent; Colorado Springs, Colo.—17 percent; Wilmington, N.C.—16 percent; Tallahassee, Fla. — 16 percent; Albany, Ga.—16 percent; Lakeland-Winter Haven, Fla.—15 percent; Fort Myers, Fla.—15 percent and Tampa-St. Petersburg, Fla.—15 percent. Total personal income in the United States increased 9 percent in 1972.

Military payrolls contributed the most to the increase in Killeen-Temple. The increase in Orlando was broadly based, with major earnings growth from services, military and construction. Construction earnings played the major role raising the income growth for the rest, and transfer payments also contributed significantly in Tampa-St. Petersburg and Ft. Myers, Fla.

Information on non-metropolitan area counties also appears for the first time in the May 1974 "Part II Survey of Current Business." The publication is available for $2.25 from the Superintendent of Documents, U.S. Government Printing Office, Washington, D.C. 20402.

Dent Calls For Ongoing Energy Effort

Energy management efforts by the American business community "by 1980 could reach the equivalent of nearly 5 million barrels a day of petroleum, a healthy saving when you realize that imported crude has already soared to $10 per barrel," according to Secretary of Commerce Frederick B. Dent.

Speaking before Governor John R. Williams' First Arizona Symposium on Energy Environment and Growth at Carefree, Arizona, Secretary Dent reported that studies are now in progress of minimum energy requirements for nine major industries which account for 80 percent of industrial energy consumption.

Although results of these studies are not yet available, Secretary Dent cited as examples several estimates of savings in the commercial sector. It has been demonstrated that by using the latest building materials and techniques, energy requirements for new buildings can be reduced by 40 percent. For existing buildings, a reduction of about 25 percent can be achieved through refitting and improved operations. In business transportation, reductions of 15 to 20 percent appear possible.

Dent cautioned that "There are numerous indications that much of the American public is now acting on the assumption that because the oil embargo has ended and the energy crisis is over, we can all go back to our relaxed habits which existed prior to the energy crunch.

"Many of us fail to recognize that hanging over us is the threat that progress must continue in the Middle East. While much progress has been made, consider the problems that remain, such as the Palestinians, Jerusalem, and the West Bank. In addition, the problem of reaching successor agreements between Israel and Egypt and Israel and Syria remains formidable," he added.

Population Drifting From Urban Areas To Less Populous States

Rather than flocking to the cities as they have historically done, today's Americans may be reversing the trend and trying to get away from it all. Population growth patterns among the states have undergone some marked changes since the 1970 Census, according to the Census Bureau.

Major shifts during the 1970-73 period include:

- A sharp decline in the number of births in all states, causing a marked decrease in the rate of population growth. This was most noticeable in California and New York.
- A change in interstate migration whereby many southern states, which historically have lost population through this process, are attracting migrants, and most northern industrial states are having moderately heavy out-migration.
- Many smaller rural states outside of the South have grown more rapidly because increased net migration has more than offset declining births.

Florida has surpassed California in total population growth since 1970. Florida's population was estimated at 7,678,000 on July 1, 1973—888,000 more than the 1970 census count. In California, an estimated 648,000 persons were added to the population during 1970-73.

Texas, with a 1970-73 increase of 600,000 persons, was the only other state that added more than 300,000 to its total since the 1970 census. No state is estimated to have lost population during the period, although the District of Columbia's 1973 estimate of 746,000 is 11,000 less than the 1970 count.

Arizona led all states in growth rate (16.1 percent) and growth rate due to net in-migration (12.1 percent) during 1970-73. Its new estimated population total is 2,058,000, a gain of 285,000. About 200,000 of this total resulted from migration.

North and South Dakota and West Virginia, rural states that actually lost populations between 1960 and 1970, all gained during 1970-73. Estimates of the populations as of July 1, 1973 and proportionate 1970-73 gains for these states are: South Dakota, 685,000, 2.7 percent: North Dakota, 640,000, 3.5 percent; and West Virginia, 1,794,000, 2.9 percent. Examples of states where the growth rate has picked up speed are Maine and Nebraska. In Maine, the estimated 1970-73 gain was 3.5 percent (estimated 1973 population is 1,028,000) compared with a 1960-70 gain of 2.5 percent. Nebraska's estimated 1973 population of 1,542,000 meant a 4 percent gain since the 1970 census. During the entire 1960-70 decade, Nebraska's population gain was only 5.1 percent.

Ohio, which lost an estimated 185,000 persons through net out-migration during 1970-73, had the highest rate of migration loss, 1.7 percent. An estimated 268,000 persons migrated from New York, and its rate of loss was 1.5 percent.

For full details, order "Estimates of the Population of States, with Components of Change: 1970-73", P-25, No. 520. Superintendent of Documents, U.S. Government Printing Office, Washington, D.C. 20402. 75 cents.

$1 Million To Fund Indian Attractions In Four States

Grants totaling $1,003,000 have been awarded to Indians in four states by Commerce's Economic Development Administration to fund cultural attractions.

New Mexico's Pueblo of Acoma has been awarded $150,000 to construct a visitors' center at Sky City. The center will include a display area for Indian artifacts, an auditorium and a snack bar. A bait shop will be constructed nearby at Acomita Lake.

A $130,000 grant to the Miccosukee Indian Reservation in Florida will fund construction of a restaurant and visitiors' center on the Tamiami Trail. The center will provide facilities for the Indians to display their crafts items.

The Owens Valley Paiute-Shoshone Bands of Indians in Inyo County, Calif., have received $398,000 for construction of a museum-cultural building.

The United Indians of All Tribes Foundation, based in Seattle, has been awarded a grant for $250,000 to help construct an arts and crafts and cultural center at the former Fort Lawton Army base. The Foundation will provide $500,000 to complete the $750,000 total cost of the project, which is expected to employ some 140 construction workers.

A $75,000 grant has been awarded to the Pacific Northwest Indian Center, Inc., for establishment of a management system for an Indian museum and culture center at Spokane, Washington, which was built with the aid of an EDA grant.

U.S. Fishermen Gain Higher Quota In Northwest Atlantic

U.S. fishermen were granted a quota increase of 16,600 metric tons for 1975 at a recent meeting of the International Commission for the Northwest Atlantic Fisheries in Halifax, Nova Scotia. ICNAF regulates certain fisheries in international waters off the northeast coast of the United States and Canada.

The primary purpose of the meeting was to allocate a 1975 overall catch quota and seek management arrangements for fish stocks for the 17 member nations, all of which were represented except Romania. The overall quota applies to species fished in the southern portion of the Convention Area off the coast of New England and the Middle Atlantic States.

Although the overall quota was reduced from 924,000 metric tons in 1974 to 850,000 metric tons for 1975, the 1975 U.S. share of the total quota increased from 20 to 25 percent. With the exception of a modest increase for Canada, quotas of all other nations were reduced in order to provide the total required reduction of approximately 74,000 metric tons as agreed at an earlier meeting of the international group. For 1976, nations have agreed to set the overall quota at a level consistent with maintaining the maximum sustainable yield.

Data On New Tourist Attractions Sought For Bicentennial Use

Like a solicitous hostess when distinguished visitors are coming, the United States Travel Service is seeking data on all new or improved tourist attractions that will be ready for the flood of foreign visitors expected for the nation's Bicentennial celebration in 1976.

As the nation's official tourist office, USTS is compiling information on as many attractions as possible that will be ready by July 1, 1976, for publicity in international tourism publications and other media.

"International tourism to the United States is rapidly increasing, and we expect to see an even greater in-flow of visitors as we approach our Bicentennial Era," said C. Langhorne Washburn, Assistant Secretary of Commerce for Tourism.

"We need to be able to provide information on new U.S. tourism opportunities to potential travelers and to the news media in other nations. Of course, we will continue to emphasize old favorites as well."

USTS is asking state and local tourism officials in the 50 states and the U.S. possessions to submit information, which will be disseminated in more than 100 other nations.

Detailed information is being sought, including nature of the project, groundbreaking date, planned opening date, capacity, proposed hours of operation, expected admission prices, availability of guest transportation from nearby metropolitan centers and other details of interest to travel agents and potential travelers from abroad.

Photographs or artist's renderings are also requested.

Information on appropriate projects should be forwarded to Office of Information Services, United States Travel Service, U.S. Department of Commerce, Washington, D.C. 20230.

Federal Procurement To Stimulate Innovation Will Get Further Study

The success of a recent conference on using the government procurement process to stimulate new product development has prompted organizers to plan a follow-up session early next year.

The initial meeting, sponsored by the General Services Administration and the U.S. Department of Commerce at the National Bureau of Standards headquarters at Gaithersburg, Md., engaged government and industry leaders in workshop discussions. The follow-up conference will probably be held in January. The agenda of the earlier meeting featured improved methods of procurement to encourage innovations in goods which promise wide consumer benefits, including energy conservation, increased safety and reliability, and improved performance.

In an opening address to the conference, Dr. Lester C. Krogh, Vice President of the 3M Company's Commercial Chemicals Division, viewing procurement from the industry side, emphasized that commercial "spin-off" potential from government-stimulated product development has not always been recognized for its value to the nation's economy. He went on to urge the Federal Supply Service to assume a new role as a major catalyst for product innovation through NBS's Experimental Technology Incentives Program.

Workshops at the earlier session covered procurement of office machines, furniture, containerization and packaging, automatic data processing, optical and electrical instrumentation, electrical equipment, automotive products, photogenic and audio-visual items, and chemical coatings and cleaning agents.

About half of the workshop participants were government procurement specialists and user agency personnel. The others were suppliers' and manufacturers' representatives from some 60 different organizations.

In general, the workshop participants agreed on a number of recommendations related to procurement of goods and services:

- Extend all possible efforts to increase communications between suppliers, procurement personnel and the ultimate users of the procured goods and services. Such communications will serve to identify innovations, product problem areas and new procurement policies that must be implemented.
- Encourage the use of multiple award contracts to allow user agencies to choose the best available technology.
- Structure government purchasing to more clearly parallel the methods and practices used by the private sector.
- Encourage the use of realistic performance standards as the basis for procurement. Performance standards, in contrast to prescriptive design standards, tend to encourage technological innovation and enable the government to purchase new and improved products as they appear on the market.
- Expand the use of value incentive clauses in contracts to provide a monetary incentive to industry. Such incentives encourage the upgrading of products and services while at the same time allowing industry to share in the savings.
- Purchase of goods and services on the basis of lowest total cost of ownership instead of lowest initial acquistion price. In other words—pay a little more initially for an item that will cost less to own, operate, maintain and dispose of.
- The government should test, certify or pre-qualify products to ensure more uniform or improved quality of goods purchased.
- Establish a central office or specific commodity office to routinely and systematically receive and review suggestions on improved, innovative or technologically-changed products.
- The dialog and open-forum approach initiated at this symposium should be continued at regular intervals and should involve other commodity groups.

Economic Census Users Can Get Special Briefings

Individual cities around the nation can arrange special conferences explaining the nations' economic censuses, which are canvasses of U.S. industrial and business activity taken every five years by the Census Bureau.

Twelve such conferences have already been held this year and others are scheduled for Pittsburgh, Sept. 24; Minneapolis, Oct. 22; Milwaukee, Oct. 23; and Cleveland, Nov. 13.

The conferences provide data users with information on such aspects of the 1972 Economic Censuses and related economic programs as current surveys of business and industrial firms, and County Business Patterns. Census Bureau officials discuss subject matter, census geography, publications, computer tapes, special tabulations and economic trends.

The Economic Censuses are an important source of facts about the structure and functioning of the U.S. economy and provide information essential to both business and government. From the censuses come benchmark data on retail trade, wholesale trade, selected service industries, construction industries, manufacturers, mineral industries and transportation.

To date, some 2,200 data users from government agencies, business and academic institutions have attended 12 conferences held in 1974. Additional conferences will be announced as dates are set.

Local organizations interested in sponsoring a conference should write to the Data Access and Use Laboratory, Data User Services Division, Bureau of the Census, Washington, D.C. 20233.

Connecticut Cities Lead In Per Capita, Median Family Income

The Stamford, Conn., metropolitan area ranks number one in the country in both per capita income and median family income, according to a recent Census Bureau report based on 1970 census data. The per capita income figure for the Stamford metropolitan area was $6,319, and the median family income figure was $15,834.

In second place was Norwalk, Conn., metropolitan area with $5,100 per capita and $14,649 median family income. Washington, D.C., metropolitan area was third in per capita income ($4,232) and Anchorage, Alaska, third in median family income ($13,590).

The Census Bureau report ranks all 50 states and the District of Columbia, 263 metropolitan areas and more than 3,000 counties and county equivalents according to both per capita and median family income. The Bureau, part of Commerce's Social and Economic Statistics Administration, used 1969 figures, which were gathered in the 1970 census.

Among counties and county equivalents, Arlington County, Va., had the highest per capita figure, $4,446, and Hinsdale County, Colo. (pop. 111), the highest median family income, $18,333. Second highest per capita income was New York County, N.Y. (Manhattan Borough of New York City), with $5,212, and third, Montgomery County, Md., with $5,183. Montgomery County was second in median family income, with $16,708 and Juneau Census District of Alaska was third with $16,030.

The top five ranking states in per capita income are Connecticut ($3,885), District of Columbia ($3,842), Alaska ($3,725), New Jersey ($3,674) and California ($3,614).

The five top ranking states by median family income are Alaska ($12,441), Connecticut ($11,808), Hawaii ($11,552), New Jersey ($11,403) and Maryland ($11,057).

Copies of the report, "Per Capita Income, Median Family Income, and Low Status in 1969 for States, Standard Metropolitan Statistical Areas, and Counties: 1970", number PC(S1)-63, may be obtained for $1.05 from local Commerce District Offices or from the Superintendent of Documents, U.S. Government Printing Office, Washington, D.C. 20402.

THE FIRST ROUNDUP—*All rounded up and ready for branding, these Dungeness crabs, formerly indistinguishable from one another may now be branded by laser beams. Branding aids study of crab's habits, which improves harvesting of the species to assure its survival.*

Laser Beams Tried To Brand Crabs For Seafood Firms

Do you think that when you've seen one crab, you've seen them all? Not any more. Experiments valuable to the seafood industry are being conducted on effective methods of branding crabs. Crabs are branded as a means of tracking and studying their populations and movements.

The experiments on crab branding are being carried out by Oregon State University researchers operating under a Sea Grant program of Commerce's National Oceanic and Atmospheric Administration (NOAA).

Crab branding is quite different from branding cattle with hot-irons, primarily because crabs shed their shells, while cattle do not shed their skins. For this reason, experiments are being conducted with laser beam branding.

"Tagging or marking crabs with plastic discs or paints has proven unsatisfactory," says Richard Stroud, research associate in veterinary medicine at Oregon State University. "The crab, like all crustaceans, periodically sheds its shell to replace it with a larger one, a process called molting. When the shell is discarded, so is the tag or paint mark.

"Laser branding, however, alters some of the pigmentation cells under the crab's outer shell. When a new outer shell is formed, it too will carry the brand."

Stroud is also studying another method of marking crabs by using a copper "branding iron" cooled to subzero temperatures.

"At present, we are confining our work to the Dungeness, since it is one of Oregon's most valuable seafood products, and also one of the least studied. Little is known about the Dungeness because there has been no way to keep track of which individual crab was which.

"If freeze-branding or laser-branding proves successful for Dungeness, we may try using it on other types of crabs or possibly other crustaceans, like lobsters."

Stroud's research is being conducted in cooperation with the Fish Commission of Oregon and the U.S. Department of Agriculture.

Loan Aids Minority Insurance Association Service To Membership

Minority insurance firms will receive a boost from the National Insurance Association through a $125,000 contract with the Department of Commerce's Office of Minority Business Enterprise.

"Minority owned and operated life insurance companies have traditionally been the backbone of minority business activity," OMBE Deputy Director Samuel J. Cornelius said. "We must provide these firms with the management tools they need to continue to compete successfully."

Founded in 1921, the National Insurance Association was funded by OMBE in 1973 to establish a minority trade association. Under the terms of its contract, the association provides market surveys, identification of financing sources, development of common accounting procedures, trade and technical information, training seminars and technical and management assistance.

"The potential for life insurance expansion has never been better," Cornelius noted. "As the personal income and personal security needs of the population are increasing, minority firms concentrated in urban centers have a good opportunity to provide the services associated with urban living."

Minority firms, however, must place greater emphasis on building the quality of their services and the management expertise of their personnel in Cornelius' views.

OMBE funds 21 such minority business and trade associations nationwide to organize minority businessmen in the same trade and provide cooperative services that improve their competitive positions.

Accord Should Boost Flow Of Japanese Tourists To U.S.

"The Brooklyn Bridge? I can get it for you wholesale." For five Japanese travel firms that kind of offer is not as outlandish as it sounds. The United States Travel Service has signed contracts with the five as part of its tour development program.

More than 36,000 Japanese visitors are expected to visit various tourist attractions in the United States during 1974 and 1975 on tours stimulated by these Japanese travel wholesalers.

The travelers are expected to produce revenue for the U.S. estimated at more than $18 million.

Under the tour development program, details of tour packages are worked out jointly by USTS and the foreign travel wholesalers. USTS assists the foreign operator by providing contacts with American travel suppliers; "product" information for tour content; familiarization tours for foreign travel agents to acquaint them with the new U.S. packages; and marketing support including financial input to advertising, tour catalogs and point-of-sale material.

Wholesalers are responsible for producing, promoting and operating the tours.

USTS recently completed tour contract arrangements with the following Japanese firms: Jet Tours (World Tour Operators), Kinki Nippon, Japan Travel Bureau, Nippon Travel Agency and Japan Creative Tours.

"Japan is our largest source of overseas visitors to the U.S.," said Assistant Secretary of Commerce for Tourism C. Langhorne Washburn. "There is a tremendous need in the Japanese market for package tours which provide both low-cost travel arrangements which tourists can afford, and a way of relieving fears of a possible language barrier while traveling in the U.S."

Municipalities, Housing Two Of Three Americans, Show Economic Muscle

The American municipality is growing enormously as a spender, and consequently as a user of tax funds, and thus is expanding rapidly as a consumer of a vast variety of goods and services.

The extent to which this is happening is shown in a report entitled "Finances of Municipalities and Township Governments, 1972 Census of Governments, Volume 4, No. 4," published by Commerce's Bureau of the Census.

The report, one of a series from the 1972 Census of Governments, is prepared every five years by Census to provide statistical data on governmental activity in the nation. The years chosen to obtain this data are those ending in "2" and "7."

Municipalities consist of municipal corporations set up to provide a variety of local public services for areas of relatively concentrated population.

About two-thirds of the people of the country live in areas served by municipal governments. Municipalities in 1972 accounted for more than one-third of the aggregate revenue and expenditure of all local governments, and more than 40 percent of all local government indebtedness.

In the 1971-72 fiscal year, the report shows, the nation's municipalities received $42.1 billion in revenue and spent $43.7 billion. This contrasted with $16.8 billion received and $17.3 billion spent in the 1961-62 fiscal year, an increase of 151 percent in revenue and 152 percent in spending in the 10-year span. In fact, revenue rose 75 percent and spending 79 percent in the five-year interval from 1966-67 to 1971-72.

At the end of the 1971-72 fiscal year, municipal debt outstanding totaled $52.6 billion as compared with $26.9 billion at the end of the 1961-62 year, an increase of 95.5 percent. During the year, municipalities issued $6.3 billion and paid off $2.7 billion of long-term debt.

Six most expensive

Six functions account for 54 percent of the total general expenditures of municipal governments. These are education, police protection, sanitation, public welfare, highways, and fire protection, in that order.

The report points out that municipal general expenditures jumped from $13.5 billion in the 1961-62 year to $35.9 billion in the 1971-72 year, or 166 percent.

How spending for the six major functions advanced in the 10-year span is shown by the following figures:

Education, $1,952 million to $5,861 million, 200 percent; police protection, $1,475 million to $3,968 million, 169 percent; sanitation, $1,501 million to $3,317 million, 121 percent; public welfare, $710 million to $3,035 million, 327 percent; highways, $1,701 million to $2,804 million, 65 percent; fire protection, $988 million to $2,218 million, 124 percent.

Spending for other activities likewise increased. The following figures show the extent of the rise:

Hospitals, $699 million to $2,069 million, 196 percent; health, $191 million to $685 million, 258 percent; parks and recreation, $640 million to $1,573 million, 146 percent; housing and urban renewal, $642 million to $1,491 million, 132 percent; airports, $193 million to $533 million, 176 percent; water transport and terminals, $77 million to $164 million, 113 percent; parking facilities, $68 million to $156 million, 129 percent; libraries, $211 million to $468 million, 122 percent; financial administration, $248 million to $574 million, 131 percent; general control, $401 million to $996 million, 148 percent; general public buildings, $206 million to $529 million, 157 percent; interest on general debt, $512 million to $1,537 million, 200 percent; other and unallocable, $1,059 million to $3,923 million, 270 percent.

Taxes, the report explains, accounted for 48.6 percent of all municipal general revenue in the 1971-72 year. Intergovernmental revenue accounted for 32.9 percent, and charges and miscellaneous general revenue for 18.5 percent.

Predominant source

The property tax, is the predominant source of general revenue for municipalities from their own resources, as it is for local governments generally.

"Nationwide," the report comments, "this source in 1971-72 supplied 31.3 percent of all municipal general revenue or 64.3 percent of all municipal tax revenue.

"However, these proportions vary considerably from state to state. For example, the fraction of all municipal general revenue represented by the property tax ranged in 1971-72 from 67.8 percent in Maine down to 9.3 percent in Alabama.

"General sales and gross receipts taxes in 1971-72 accounted for $1.9 billion, or 11 percent, of all municipal tax revenue; selective sales and gross receipts taxes for $1.3 billion, or 7.7 percent; income and other payroll taxes for $1.9 billion, or 11.1 percent; and all other taxes for $900 million, or 5.2 percent of all municipal tax revenue."

Property tax collections as a part of municipal general revenue increased from $5.8 billion in 1961-62 to $10.9 billion in 1971-72, or 88 percent.

The report shows that township governments during fiscal 1971-72 received $4.1 billion in revenue and that their expenditures amounted to $4.2 billion.

Township governments are found in 21 states and exist to serve inhabitants of areas defined without regard to population concentration. The category includes governmental units legally termed 'towns' in New York, Wisconsin, the six New England States, similar units in 11 other states, as well as some 'plantations' in Maine and 'locations' in New Hampshire.

The vast majority of townships are rural local governments performing a limited range of governmental services. In some states, however, through optional and permissive legislation, they may provide a range of services that approaches or parallels that of municipalities.

(Copies of the report are available for $4.80 from the Superintendent of Documents, U.S. Government Printing Office, Washington, D.C. 20402, or from Commerce District Offices in major U.S. cities.)

Minority Firms Assured Role In Alaska Pipeline Project

Minorities firms will have outstanding opportunities to participate in the construction of the $4.5 billion Trans-Alaska Pipeline over the next three years, according to Commerce's Office of Minority Business Enterprise. OMBE is assisting the Alyeska Pipeline Service Co., builder and operator of the pipeline, and the Department of the Interior in carrying out their plans for minority firm participation in the project.

Interior, which granted Alyeska authority to build the line, has primary and statutory authority for overseeing the company's compliance with the authorization act elements calling for minority firms to be offered viable opportunities to participate in the project.

OMBE will make these opportunities known to every minority firm that might have or be able to develop the capability to participate in the construction or supply and service areas. In addition to notifying these firms of the opportunities, OMBE's business development organizations will help them prequalify to bid.

OMBE has also developed a full system to follow-up and monitor the program, as well as provide minority businessmen with continuous information on current and future contract opportunities.

To date, more than 30 construction, supply and service business opportunities applicable to minority firm participation have been identified. More are expected as the actual pipeline construction gets under way, and still others after it is completed.

Minority firms should write: Pipeline, National Programs Division, Office of Minority Business Enterprises, U.S. Department of Commerce, Washington, D.C. 20230.

Patent Reports Outline Shape Of Business World To Come

U.S. businessmen can get an advance peek at tomorrow through the latest in a series of technology assessments released by Commerce's Patent Office. Third in the series, the new report focuses on coal gasification and shale oil technologies; gives an overview of the technical activity in a number of states and foreign countries; and pinpoints a number of specific, fast growing technologies.

The report is the latest in a series of publications by the Patent Office's new Technology Assessment and Forecast program. Established as part of Commerce's continuing services to U.S. business, industry and the scientific and engineering communities, this program is aimed at tapping the vast files of patented technology maintained by the Patent Office.

The patent file, which is constantly being restructured to accommodate new technologies and changes in existing ones, now contains about 11 million U.S. patent documents, to which approximately 250,000 are added each year. Since about 30 percent of these are being issued to residents of foreign countries, the flow of documents into the file is, in many ways, reflective of technological activity worldwide.

This resource has been used little outside the patent community and rarely examined for the purpose of analyzing technological activity. The Office of Technology Assessment and Forecast (OTAF), which administers the program, was established to stimulate and enhance the use and useability of the patent file to assemble, analyze and make available meaningful data about the file.

"The Patent Office has a staggering amount of technical information in its files," Commissioner of Patents C. Marshall Dann said, "and we want very much to make it more easily available and more useful to as wide an audience as possible. We obviously can't do the whole job all at once. The problem is what to do next—what information and what data is most needed and most useful to the most people?"

To help bring about the needed improvement, readers' suggestions are solicited.

Copies of the first and second reports are available from the National Technical Information Service, U.S. Department of Commerce, Springfield, Virginia 22151. Ask for *Initial Publication of the Office of Technology Assessment and Forecast*, May 1973: COM 73-10767, $3, and *Early Warning Report to the Office of Technology Assessment and Forecast*, December, 1973: COM 74-10150, $6.75.

Inquiries concerning the OTAF program or its publications/services should be directed to: Alfred C. Marmor, Director, Office of Technology Assessment and Forecast, U.S. Department of Commerce, Washington, D.C. 20231.

Calendar For Businessmen

Sept. 4-5—Arlington, Va.—Methods For Evaluating Policy Impact on the Refining Industry conference, Stouffer's National Center Inn. Sponsors: Federal Energy Administration and National Petroleum Refiners Assoc. For information, NPRA, Suite 802, 1725 De Sales St. NW., Washington, D.C. 20036. (202-638-3722.)

Sept. 4-6 — San Francisco — Council for Urban Economic Development seminar, PSA Hotel. For information, Council for Urban Economic Development, 1620 Eye St. N.W., Washington, D.C. 20006. (202-293-6911.)

Sept. 5—New York City—Fourth Annual Eco-Technic Recycling Conference, Waldorf-Astoria Hotel. Sponsor: National Association of Recycling Industries, Inc. For information, National Association of Recycling Industries, Inc., 330 Madison Avenue, New York, N.Y. 10017.

Sept. 8-10—Ipswich, Mass.—Revolution In On-Line Information Storage and Retrieval Systems conference, Castle Hill Conference Center. For information, Dick Murray, Institute for Graphic Communication, Inc., 375 Commonwealth Ave., Boston, Mass. 02115. (617-267-9425.)

Sept. 9-10—New York City—First National Structural Foam Conference, Roosevelt Hotel. Sponsor: New York University. For information, Alex Makowski, New York Management Center, Dept. 14-NR, 360 Lexington Ave., New York, N.Y. 10017. (212-953-7272.)

Sept. 9-11 — Chicago — 3rd International Pollution Engineering Congress, McCormick Place. Held in conjunction with 3rd International Pollution Engineering Exposition. For information, Clapp & Poliak, Inc., 245 Park Ave., New York, N.Y. 10017. (212-661-8410.)

Sept. 11-12—New York—Conference On Terrorism and Executive Safety, World Trade Center. For information, The World Trade Institute, 55th Floor, One World Trade Center, New York, N.Y. 10048. (212-466-3150.)

Sept. 24—Pittsburgh — 1972 Economic Censuses user conference. For information, U.S. Dept. of Commerce Pittsburgh District Office.

Grant Increases Minority Role In City Renewal

Commerce's Office of Minority Business Enterprise has made a $270,629 grant to the U.S. Conference of Mayors/National League of Cities to fund minority business development.

The one-year research grant is to develop a program for coordinating city revitalization plans with OMBE's minority business assistance organizations. There are several hundred of these groups around the country which advise minority firms on financing, marketing, management and technical assistance. Various means of community renewal will be considered including clustering several stores together in special neighborhood business centers.

Speaking of the grant, OMBE Director Alex Armendaris said, "If we are to restore life to our neighborhoods, the vital organ of our cities, we must insure that business can grow there. Today we have only a piece of the puzzle, yet we do know that minority entrepreneurship can help restore the vitality of our inner city neighborhoods."

In addition, the investigation will survey the nature and extent of activity currently being performed by local governments in support of minority business development.

Information based upon this data will be provided to city officials as to the most effective use of city resources for business development.

Attention will be given to local government purchasing, land use development, zoning, building codes, permits and licenses, transportation systems, education and training in manpower development programs, environmental control programs and other factors with impact on local revitalization.

Based upon this information, mayors from 25 key cities will convene in Washington in the fall of 1974 to outline ways in which these guidelines may be implemented. Additional conferences of mayors and business development experts will be held in each of OMBE's six regions to further disseminate the information and describe how such a typical program would operate, delineating the roles of city officials, OMBE-funded organizations, other federal agencies and local private financial institutions.

Saudi Arabia, Making Plans To Modernize Its Economy, Asks Major U.S. Business Role

Saudi Arabia, seeking to use its vast oil revenues to modernize and diversify its economy, plans to enlist the assistance of U.S. business in industrialization projects ranging beyond an $18 billion total. A number of these projects are now being identified for action in the months immediately ahead.

This is the report of a Commerce Department official who has just returned from the Near East, where he met Saudi leaders in connection with the newly-etsablished Joint U.S.-Saudi Arabia Commission on Economic Cooperation.

The official is Dr. Charles W. Hostler, Jr., Deputy Asst. Secretary for International Commerce and Director of the Bureau of International Commerce. He served as U.S. chairman of the Working Group on Industrialization, one of four such groups set up under the commission.

Importantly involved in the activities of the working group will be the Commerce Action Group for the Near East, a unit recently set up within the Bureau of International Commerce to focus priority attention on the greatly increased opportunities for American business in the nations of the Near East.

Dr. Hostler is urging U.S. company executives and business and technical consultants to prepare now for cooperative efforts with the Saudi Arabians. He said the working group hopes to announce soon a meeting with U.S. businessmen interested in participating in Saudi Arabia's development, at which the new opportunities and appropriate intstitutional arrangements will be discussed.

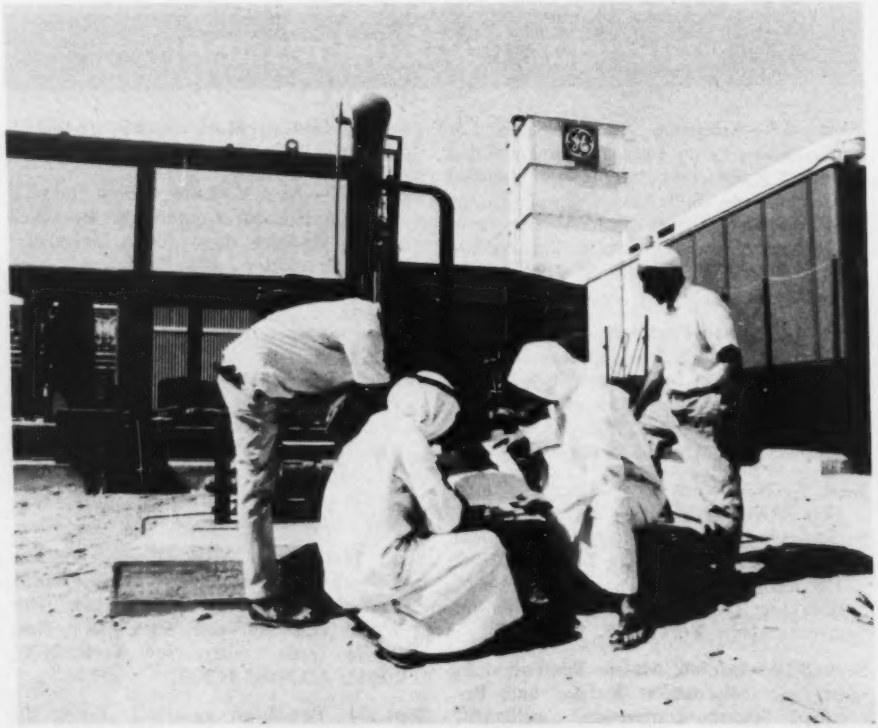
The U.S.-Saudi Arabia commission is scheduled to hold its first formal meeting in Saudi Arabia in October. The U.S. membership wil be led by the Secretary of the Treasury and includes representatives from the Departments of State, Treasury and Commerce, the National Science Foundation and other agencies.

The Saudi Arabian Minister of State for Finance and National Economy will lead his country's members, who will include representatives from the Ministries of Foreign Affairs, Finance and National Economy, Commerce and Industry and the Central Planning Organization.

At the October meeting the commission will review plans made in the meantime by joint working groups on industrialization, manpower and technical education, technology and scientific development, and agriculture. Some of these proposals will cover the use of flared gas in fertilizer production, solar energy and desalination, desert agriculture, and development of educational and technical institutions. Periodic visits to Saudi Arabia by U.S. scientists, engineers and research specialists will be fostered.

Hostler summarized the progress made so far in the discussions: "The Saudis want to proceed with industrialization and development of their infrastructure as rapidly as possible, and my Working Group—on Industrialization—was concerned with ways for the U.S. to assist in this effort. We attempted to determine at these initial sessions the nature and extent of U.S. involvement wanted by the Saudis, to indicate in turn what the U.S. Government would do, and to formulate a strategy for our cooperative efforts. We also tried to identify areas in which immediate actions could be undertaken."

Hostler explained that the Saudis indicated in the meetings that they welcome a massive U.S. involvement, both governmental and private, in their development plans. He said that the industrial projects



U.S.-BUILT POWER EQUIPMENT FOR SAUDI CAPITAL—*General Electric moved rapidly to supply a 15,000 KW gas turbine plant for power-short Riyadh, fulfilling a contract with the Riyadh Electric Company & Suburbs. Many such infrastructure projects are being planned.*

already identified—that is, set forth in general outline—amount to approximately $18 billion. To this should be added large-scale efforts in the fields of power, communications, transportation, housing, etc., to support the new industries that will be created.

"Saudi Arabia," he declared, "wants the U.S. Government to help it find qualified American firms to undertake these projects."

It was apparent that while the Saudis have the financial resources to pay for development, they have a shortage of technology, trained manpower and management capabilities. The U.S. is thus being asked to help provide these services on a massive scale.

"The U.S. Government can be the catalyst," Hostler continued, "in obtaining the necessary technicians and advisors to serve in Saudi Arabia, and also to train Saudis in the United States. Some of these qualified people will be initially supplied by the U.S. Government from its resources, but the sheer magnitude of Saudi needs—they talk in terms of hundreds of advisors—means that we will place major reliance on the resources in our private sector."

Preliminary agreements

The working group reached preliminary agreement, subject to ratification at the October formal sessions, that the U.S. would set up a liaison office in Riyadh. The Saudis are considering the establishment of a similar office in the U.S.

Also, it was agreed that the U.S. would promptly send specialists from the Commerce and Treasury Departments to recommend technical assistance programs in five specific priority areas—establishment of a base of useful economic statistics, development of an industrial information and documentation center, improvement of customs procedures, upgrading of port management, and establishment of environmental standards.

The way was prepared for an "umbrella" Technical Cooperation Agreement which will provide the frame for reimbursement by Saudi Arabia of services supplied by the U.S.

The Saudis transmitted two lists of projects on which they want to move ahead now. One, in the so-called "hydrocarbon" area, involves 35 massive undertakings in the petroleum refining, petrochemicals, fertilizer, shipbuilding and mining fields. In many of these, potential U.S. partners have already become involved.

The other, in the "non-hydrocarbon" area, includes about 70 projects of sizable but lesser dimensions in such fields as food and beverage processing, textiles and apparel, wood products, paper products and printing and publishing, pharmaceuticals, chemicals and plastics, glass, brick and block making, cast iron foundries, and fabricated metal products, ranging from bolts, nuts and nails and ball point pens to safes and refrigerators.

Washington's Official Trade Briefs

This article is another in a series of reports outlining actions by domestic, foreign, or international agencies affecting world trade, as compiled by the Legislative and Tariff Policy Division of the International Economic Policy and Research Staff's Office of International Trade Policy.

THE PRESIDENT

Exports: The President has acted to continue by Executive Order the authority for administering programs formerly conducted under the Export Administration Act of 1969, as amended. The Act expired at midnight July 30 after having been extended once for a 30-day period.

THE CONGRESS

Committee Hearings—Senate: The Commitee on Finance, meeting in executive session, continued its consideration of H.R. 10710, the Trade Reform Act of 1973, and is scheduled to continue mark-up action on the bill in future sessions.

The Subcommittee on Multinational Corporations of the Committee on Foreign Relations concluded hearings to explore whether the United States should continue to sell sophisticated technological know-how to the Soviet Union.

The Subcommittee on Economic Growth of the Joint Economic Committee held three days of hearings on prices and supplies of industrial raw materials.

Committee Hearings—House: The Subcommittee on Europe of the Committee on Foreign Affairs held a hearing on export of police equipment. Testimony was heard from State and Commerce Department witnesses.

The Subcommittee on International Organizations and Movements and the Subcommittee on the Near East and South Asia held a joint hearing on U.S. foreign policy and export of nuclear technology to the Middle East.

The Subcommittee on International Trade of the Committee on Banking and Currency met and approved for full committee action a clean bill, to be introduced, in lieu of H.R. 13838, Export-Import Bank Act.

Bills Reported: The Senate Committee on Finance favorably reported the following eight tariff bills:

H.R. 6191, an act to amend the Tariff Schedules of the United States (TSUS) to provide that certain forms of zinc be admitted free of duty; H.R. 7780, an act to extend for an additional temporary period the existing suspension of duties on certain classifications of yarns of silk; H.R. 11251, an act to amend the TSUS to provide for duty-free entry of methanol imported for use as fuel; H.R. 11452, an act to correct an anomaly in the rate of duty applicable to crude feathers and downs, and for other purposes; H.R. 11830, an act to suspend the duty on synthetic rutile until the close of June 30, 1977; H.R. 12035, an act to suspend until the close of June 30, 1975, the duty on certain carboxymethyl cellulose salts; H.R. 12281, an act to continue until the close of June 30, 1975, suspension of duties on certain forms of copper; and H.R. 13631, an act to suspend for a temporary period the import duty on certain horses.

The Committee on Finance also favorably reported H.R. 6642, an act to suspend duties on certain bicycle parts and accessories until the close of Dec. 31, 1976.

The Senate Foreign Relations Committee ordered favorably reported S. 2357 authorizing approximately $15 million to be paid over a 3-year period for U.S. participation in the African Development Fund of the African Development Bank and S. 2193, authorizing approximately $362 million to be paid over a 3-year period for U.S. participation in the Asian Development Bank.

The House Banking and Currency Committee ordered reported H.R. 15977, extension of the Export-Import Bank Act.

Bills Passed: The Senate passed S. 3792, Export Administration Act, to amend and extend the authority of the Secretary of Commerce for regulation of exports.

The Senate passed S. 3698, enabling Congress to concur in or disapprove international agreements for cooperation in regard to nuclear technology.

The Senate took from the calendar and passed H.R. 8217, exempting from import duty certain foreign equipment and repairs for vessels operated by or for any agency of the United States where entry was made in connection with vessels arriving before Jan. 5, 1971.

H.R. 6642, extending to the close of Dec. 31, 1976, the existing suspension of duties on imports of certain bicycle parts, was passed by the Senate.

The Senate agreed to the House amendments to S. 2665, authorizing $1.5 billion for increased participation by the United States in the International Development Association, thus clearing the measure to be sent to the White House.

The Senate passed S. 2193, authorizing approximately $362 million to be paid over a 3-year period for U.S. participation in the Asian Development Bank.

The House passed H.R. 13370, to suspend until June 30, 1976, the duty on catalysts of platinum and carbon used in producing caprolactam.

Presidential Message — International

Coffee Agreement: The House received and read a message from the President on his annual report on the operations of the International Coffee Agreement. The message was referred to the Committee on Ways and Means.

New Legislation: Since the opening of the 93rd Congress, some 655 trade and related bills have been introduced. Legislation not previously reported in the Trade Briefs column includes S. 3768, to amend the International Economic Policy Act of 1972 to provide for Senate confirmation of the Chairman of the Council on International Economic Policy; S. 3792, an original bill to amend and extend the Export Administration Act of 1969; and S. 3824, to amend section 8e of the Agricultural Adjustment Act of 1953, to subject imported tomatoes to restrictions comparable to those applicable to domestic tomatoes.

Also, H.R. 15583, to amend the Export Administration Act of 1969 to require that all proposed agreements between the United States and any foreign nation providing for transfer or distribution of nuclear materials or technology be subject to congressional approval; H.R. 15921, to amend the Federal Meat Inspection Act to require that imported meat and meat food products made in whole or in part of imported meat be labeled "imported" at all stages of distribution until delivery to the ultimate consumers; H.R. 15985, to insure that foreign articles of clothing are not exempt from the country-of-origin marking requirements of the Tariff Act of 1930 by reason of certain processing after importation; and H.R. 16172, to provide for the temporary suspension of duties on importation of polystyrene resins, certain polyethylene resins, and polypropylene.

TARIFF COMMISSION

Adjustment Assistance — Workers: The Commission reported to the President that certain workers of the Auerbach Shoe Co., Boston **(footwear)** do not meet the requirements of the Trade Expansion Act of 1962 (TEA) to apply to the Department of Labor for adjustment assistance.

The Commission reported to the President that former workers of the Woodbridge, N.J., plant of the RCA Corp. **(receiving tubes and tube mounts)** meet the requirements of the TEA to apply to the Department of Labor for adjustment assistance.

Section 337 (Unfair Import Competition): A complaint was filed with the Commission on behalf of Eaton Corp. of Cleveland, Ohio, alleging unfair methods of competition and unfair acts in the importation or sale of certain hydraulic tappets. The complaint names Welles Manufacturing Corp. and Power Industries, both of Union and Ludlow Sts., Northwale, N.J., as either importing or offering for sale the subject products.

As a result of an investigation instituted in response to a complaint filed on behalf of Venus Esterbrook Corp., of New York, the Commission did not find unfair methods of competition and unfair acts in the importation and sale of certain writing instruments and nibs therefor, the effect or tendency of which is to destroy or substantially injure an industry, efficiently and economically operated, in the United States, or to prevent establishment of such an industry.

The Commission is withholding further action in its proceedings in Investigation No. 337-36, Doxycycline, pending the outcome of the appeal now pending before the U.S. Circuit Court of Appeals, 8th Circuit, in the case of **Pfizer v. International Rectifier.**

An amended complaint was filed with the Commission under section 337 of the Tariff Act of 1930 filed by Ideal Security Hardware Corp. of St. Paul, alleging unfair acts in importation and sale of certain chain door locks said to be embraced within the claims of U.S. Patents No. 3,161,035; 3,275,364; and 3,395,556.

Section 337—Hearings: The Commission will resume its public hearings in connection with Investigation No. 337-37, Golf Gloves, on Aug. 23, and will resume its hearings in connection with Investigation No. 337-38, Expanded, Unsintered Polytetrafluoroethylene in tape form, on Sept. 9. Both hearings will be held at the Commission Building in Washington.

Having received advice from the Treasury Department that it affirms its determination that prime-grade and off-grade northern bleached hardwood kraft pulp from Canada is being or is likely to be sold in the United States at less than fair value (LTFV) within the meaning of the 1921 Antidumping Act, the Commission has instituted an investigation to determine whether, if the finding of dumping were revoked, an industry in the United States would be or would likely be injured by reason of importation of such pulp into the United States.

The Treasury Department also informed the Commission that wrenches, pliers, screwdrivers, and metal-cuting snips and shears from Japan are being, or are likely to be, sold at LTFV. The Commission instituted an investigation to determine whether an industry in the United States is being or is likely to be injured, or is prevented from being established, by reason of the importation of such merchandise.

Investigations—Workers: On the basis of petitions filed under section 301(c)(2) of the TEA of 1962, the Commission has opened four new investigations on the effects of imports on behalf of workers and former workers of the Watertown, N.Y., plant of the Black Clawson Co., New York **(paper machinery and parts);** Claudia Footwear, Inc., Wood, Pa., a subsidiary of Kass Footwear Corp., New York **(footwear for women);** Chicago plant of the Chamberlain Mfg. Corp., Elmhurst, Ill. **(radio remote control garage door openers);** and the Tell City, Ind. plant of the General Electric Co., New York **(electronic receiving tubes and components thereof).**

Investigations—Firms: The Commission has opened two new investigations into the effect of imports on two firms under section 301(c)(1) of the TEA of 1962. Firms which have petitioned the Commission are John Swenson Granite Co., Inc., Concord, N.H. **(manufactured granite)** and the Winig Shoe Corp., Gloversville, N.Y. **(footwear for women).**

OTHER AGENCIES

Treasury—Dumping: The Treasury Department initiated an antidumping investigation on imports of chicken eggs in the shell from Canada.

Labor — Adjustment Assistance: About 1600 employees of the Woodbridge, N.J., plant of the RCA Corp. **(electronic components)** and approximately 250 employees of the Westland Shoe Corp., Biddeford, Maine **(women's footwear)** have been certified by the Labor Department as eligible to apply for trade adjustment assistance. The workers became unemployed or lost their jobs as a result of increased imports of electronic components and women's footwear.

Customs Court Ruling: On July 8, the Customs Court ruled that the Presidential Proclamation 4074 of Aug. 15, 1971 (10 percent import surcharge) was invalid. The government has 60 days from July 8 to appeal the case.

Burlingame Heads New U.S.-Yugoslav Economic Council

John F. Burlingame, an executive with General Electric's International & Canadian Group, has been elected as the first board chairman of the United States—Yugoslav Economic Council, established last month with offices at 65 Liberty St., New York.

Chosen as vice chairmen were Chauncey E. Schmidt, First National Bank of Chicago; Herbert H. Lyon, Dow Chemical; and John F. Waddle, Sears, Roebuck.

The organizational meeting was held in New York July 19 with about 30 industrial and banking executives interested in economic cooperation between the two countries in attendance.

Meanwhile a Yugoslav counterpart to the U.S. Council, the Yugoslav Chamber for the Promotion of Economic Cooperation with the U.S.A., was officially inaugurated with 102 charter members and a staff to be based at the Yugoslav Federal Chamber of Economy in Belgrade.

Both organizations were formed as a result of discussions between Secretary of Commerce Frederick B. Dent and Yugoslav Deputy Premier Jakov Sirotkovic last year.

Trade Fairs, Centers

U.S. Communications Equipment Show In Mexico Confirms Strong Market

A recent exhibition by 48 U.S. telecommunications equipment manufacturers at the U.S. Trade Center in Mexico confirmed the presence of a strong market in that country for such equipment. Total Mexican imports of these goods are estimated at $140 million for 1974 and, although the United States historically supplies just under half of this total, U.S. exporters face strong competition from Sweden and West Germany. The exhibition should help maintain the U.S. share in this important market.

The 10 percent average annual growth rate of Mexico's purchases of telecommunications equipment will probably not slacken in the near future in view of several sizable projects announced by the Government of Mexico. These include a time sharing program for data transmission, two new airports (one to replace the present Mexico City international airport), a major improvement of military operations, and the expansion and improvement of outlying airports. Mexican Government purchases represent a major sector in this market.

The Trade Center exhibition received numerous representations from the several Mexican Government agencies working in this field. Many visitors also came from key end-users such as the railroads, power companies, state-owned petroleum company, telephone companies and radio studios.

David Matson, product manager for Pulse Communications Inc. of Falls Church, Va., found a strong demand for his company's telephone terminating and signaling equipment and its data transmission equipment. He noted that the "people contacted were well qualified." James Harvey of Standard Communications Corp. which used the exhibition to penetrate the Mexican market, reported that the show would "help improve our sales in Mexico."

A Mexican engineer stated at the opening press conference that, relatively speaking, Mexico enjoys the best communication system in Latin America. As it is clearly the intention of the Mexican Government and related industries to maintain this position, the market will continue to be a major one for U.S. exports.

Food Processing Machinery Sells Well In Mexico

Twenty-seven U.S. companies recently generated sales of $331,000 in food-processing equipment from the exhibition floor of the U.S. Trade Center in Mexico City. Follow-on sales were projected at over $4 million, with new-to-export firms accounting for slightly more than $1 million of this figure. The show was attended by about 1,000 prospective buyers who came from all over Mexico as well as from each of the five Central American countries and as far away as Panama.

The major food processing companies of Mexico, contacted during the market promotion campaign for the show, were unanimous in their opinion that prospects for the Mexican food industry are excellent. They were all operating at full capacity and all had expansion plans for the near future.

Products which sold well during the exhibition included cartoners, pulper/finishers, citrus juice extractors, sanitary pumps, homogenizers, salad maker/mixer, meat cutting & slaughterhouse equipment, snack-making equipment.

One company has doubled its sales every four years since coming to Mexico. Currently, the approximately 50 percent of the population which lives in the rural areas consume relatively little processed food because of ignorance of them or due to a lack of purchasing power. Even in urban areas, only about half the population is well acquainted with and able to buy processed foods. Thus, Mexico has a potential untapped market for processed foods of some 75 percent of the population.

The industry has been facing problems due to shortages of basic packaging materials such as plastic containers and tin cans. Slow growth in production of certain agricultural products has also been a problem for some companies. There is increasing interest in better quality control for production of processed foods.

IN MEXICO—*During U.S. telecommunications equipment exhibit, Charles La Fuentes of Continental Trading Corp., explains to a representative of the telephone company the "wire saving" features of his company's systems. In right photo, during food processing machinery display, John Hammersly (right), Brown Int'l, points out advantages of juice pulper-finisher to prospective customer.*

U.S. Printing, Packaging Equipment At Spanish Show Finds Ready Market

Seventeen firms displaying their equipment at the U.S. exhibition held at Barcelona's GRAPHISPACK show last spring found the Spanish market highly receptive to American printing and packaging equipment. The U.S. exhibition generated 1,304 sales leads and $610,650 in immediate sales, while sales projected over the next 12 months amount to $4.5 million. Slightly more than $2 million of this projection is attributed to U.S. firms new to export or the Spanish market. Eighteen representation agreements were signed and 19 others are being negotiated.

The U.S. exhibition favorably impressed most visitors and received an award for excellence from the GRAPHISPACK authorities. The U.S. exhibitors were equally well pleased with the show as a means of promoting their products in the fast growing Spanish market. GRAPHISPACK, Spain's only show of printing and packaging equipment, is held once every four years and attracts visitors not only from Spain, but from a number of other countries. Attendance at this year's show totaled 145,000; there were 1,091 exhibitors.

The experience of the U.S. firms at GRAPHISPACK established that current demand in Spain for printing and packaging equipment is strong, and that the long-range outlook is very good. Three exhibitors that reported exceptionally favorable sales results for their products were Harris Intertype Corp. of Cleveland, Ohio, Shuttleworth Machinery Corp. of Huntington, Ind., and Webtron Corp. of Glenview, Ill.

CATERING EQUIPMENT SHOW — *At Frankfurt U.S. Trade Center's display of hotel and restaurant equipment, E. Reuss (left) of Rowe Int'l, talks to a German visitor about firm's "general merchandiser."*

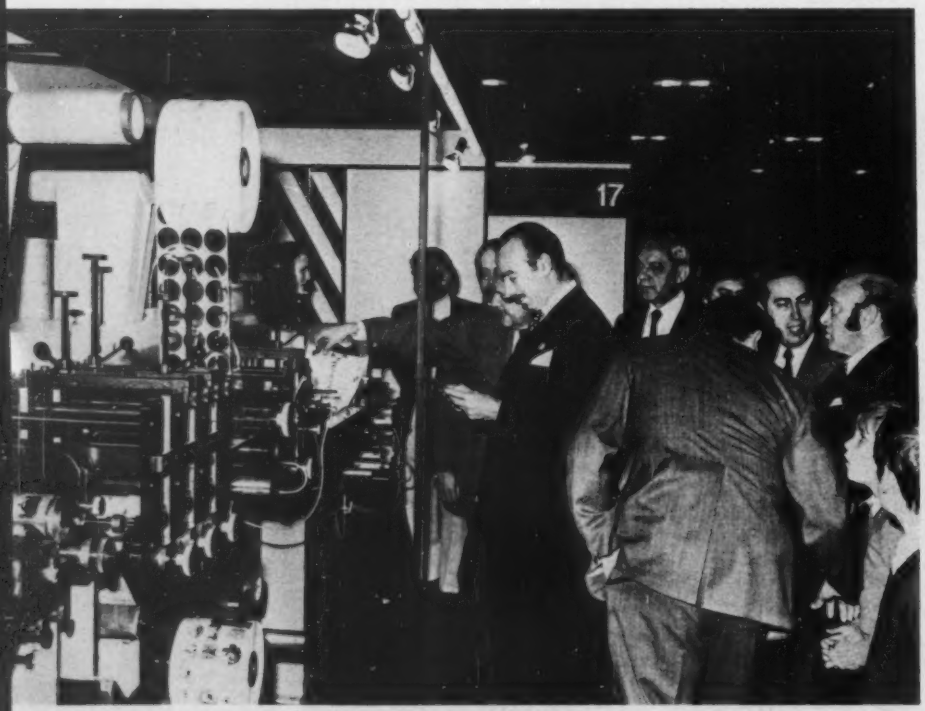
Catering Equipment At Frankfurt Trade Center Attracts Buyers

With the vacation season in Germany in full swing and the soccer world championship attracting nationwide attention—keeping German hotels and restaurants more than busy—the catering equipment displayed at the Frankfurt U.S. Trade Center drew some 500 experts looking for the technical sophistication reflected in the products of 36 U.S. manufacturers.

Rib roasts, chickens, doughnuts produced at a rate of 600 pieces per hour by one single machine, tempting dishes prepared in microwave ovens—all served throughout the entire show—created a buyer-oriented atmosphere demonstrating the leading position U.S. catering equipment holds. Visitors included dealers, wholesalers, importers, distributors, and licensees.

Of the 16 U.S. companies seeking representation in Germany or other European countries, 7 concluded agreements by the end of the show; 66 agreements were under negotiation and expected to be signed within the near future.

Off-the-floor sales totaled $177,000, and projections for the upcoming year were estimated at $9.4 million. Sales by participating companies new to export or marketing in Germany accounted for about $3.4 million of the projection.



PRINTING EQUIPMENT, BARCELONA—*The leader of Spain's largest printing syndicate is given a demonstration of the Webtron Corp. 4-color press for printing labels and tags, featured in U.S. Exhibition at this year's "Graphispack," a once-in-four-years show.*

Tandem Shows, Seminars Planned For Vienna, Moscow

Manufacturers of chromatography and spectroscopy equipment have been invited by Commerce's Bureau of East-West Trade to present their products for sale to the Soviet Union, Poland, Czechoslovakia, Romania, Hungary, and Bulgaria.

Back-to-back exhibitions and seminars in the U.S. East-West Trade Center in Vienna, Dec. 3-5, and the U.S. Commercial Office in Moscow, Dec. 10-12, will give access to these markets.

Market research has indicated especially strong interest in the following products in chromatographic equipment: gradient mixers, fraction collectors, detectors, microdosing services, molecular services, liquid extractors, gas chromatographs; in spectroscopic equipment: spectro fluormeters, dual beam Bowman spectro fluormeters, flame photometers, atomic absorption spectrometers, Fourrier spectrometers and x-ray fluorescence spectrometers.

Detailed participation information is available from George Black of Commerce's Dallas District Office, phone 214-749-1515, or Lisa Unkovic, Bureau of East-West Trade, U.S. Department of Commerce, Washington, D.C. 20230, phone 202-967-4810.

Worldwide Business Outlook

Competition Toughens In France As Demand Curbs Take Effect

The French economy has been growing at a rate of about 5 percent thus far in 1974, but inflation has continued to worsen. Wages rose at an annual rate of more than 20 percent in the first quarter, and the retail price index is now rising at an annual rate of some 17 percent. At the same time, the jump in the prices of petroleum and some other raw materials will cause a trade deficit this year of $5 to $6 billion.

To meet these problems, continues the U.S. Embassy in Paris, a new austerity program has been voted. Taxes are increased on higher incomes and on corporate profits, the depreciation allowance is temporarily reduced, and a special tax on "inflationary profits" is under study. The budget will be balanced this year and next; credit restrictions will be enforced; and energy-saving measures, including restrictions on heating oil consumption, have been tightened.

These measures are officially intended to reduce inflation to annual rates of 12 percent in December 1974 and 6 percent in June 1975. French trade is to be restored to equilibrium by the end of 1975. These goals seem quite ambitious, given the government's domestic imperative of maintaining growth, full employment and social peace, and the fact that most of France's important traditional customers are in the same difficult payments position as France itself.

Stabilization? Business slowdown? Continued inflation? The questions remain to be answered. What is clear is that the government's program is designed to reduce domestic demand, and that, to one degree or another, this program could affect French purchasing, including American exports. Given the emphasis on moderating business investment, equipment goods may be especially affected.

On the other hand, the American exporter should not overestimate the problem or discount the continued importance of the French market. What he shall probably be seeing is not a drastic change in the near-term demand for imports, but rather a slowing down of the recent high rate of growth of French imports from the United States and elsewhere. It is also probable that this reduction of tempo will be selective in a manner difficult now to pinpoint. Some capital goods may be especially vulnerable. It seems likely, however, that government measures to moderate demand and investment will not fall as heavily on energy-producing facilities, for example, the new nuclear power plant program, or export-oriented industries.

The Embassy also assumes that demand will continue at a good if not spectacular pace for high technology products such as electronic components; telecommunications equipment; pollution control devices; process control instrumentation; building materials, especially insulation of all types; computers, particularly small models; sophisticated machine tools; and industrial chemicals and adhesives. Coal and copper and copper alloys also have good prospects. In consumer goods, demand has been brisk up to now, partly in anticipation of further inflation. Depending on how severely government measures will affect the consumer's pocketbook, the revived interest in American products is likely to be sustained, notably for women's and children's wear, wall and floor coverings and "do-it-yourself" tools and equipment.

The American exporter can take comfort in the knowledge that, when announcing its new policies, the French Government explicitly confirmed its intention to eschew all protectionist measures in efforts to restore equilibrium in its trade account. France remains committed to further efforts at liberalization in the multinational trade negotiations which should begin later this year. If the French market may be a tougher one to compete in, competition, nonetheless, remains the key word.

MEETING ON FRENCH TRADE PROSPECTS—*Tilton H. Dobbin (second from right), Assistant Secretary of Commerce for Domestic and International Business, spoke at a meeting of the French Chamber of Commerce in the United States in New York this summer. With Dobbin after his speech are, from left, Louis Giuspetti, Deputy Consul General of France in New York; S. Shawn of American Smelting and Refining; André J. Ditte, President, French Chamber of Commerce; and, at right, Jack French of U.S. Steel.*

Bulgaria, Meeting Most Goals, Sets More Ambitious Objectives

The Bulgarian economy, in the third year of its Sixth Five-Year (1971-75) Plan, continues to meet or surpass planned performance levels in most major economic sectors with the noteworthy exception of agriculture, reports the U.S. Embassy in Sofia.

National income as a whole increased by an estimated 8.7 percent over 1972, led by industrial production, which increased 10.6 percent. The reported increase in agricultural production, however, was 3 percent, well below the planned 7.4 percent increase, and this despite the second best wheat harvest in memory. While supplementary plans are being added to the Five-Year Plan, particularly in the areas of agriculture and labor productivity, Bulgaria is in general quite satisfied with the growth rate achieved during 1973, which is certainly one of the highest among the CEMA countries.

This year's plan

The plan adopted last December by the Council of Ministers for 1974 is even more ambitious than that for 1973. It calls for a 10 percent increase in national income, 11 percent in industrial production, 9.5 percent in labor productivity and 13 percent in industrial services. The plan this year for agricultural production, however, was set at 5 percent, reflecting the continued difficulties experienced in this area due in part to labor shortages, an inadequate level of investment, and relative neglect in favor of the industrial sector.

Investment in the industrial sector will total roughly one-half of the capital investment in Bulgaria in 1974. Statistically, industry in Bulgaria continues to make impressive gains although significant hurdles remain to be overcome. Bulgaria must still deal with labor shortages, obsolete plants and equipment, unused production capacity, uncertain management and other problems generally characteristic of socialistic economies. The problem of labor shortages has become particularly acute, and a recent National Party Conference was devoted solely to increasing labor productivity. Aside from higher bonuses and appeals for a greater work effort, the need for greater use of modern, labor-saving machinery and equipment has gained increasing recognition, and Bulgaria is looking at least in part to the West to supply such equipment.

Historically, socialist Bulgaria has placed its greatest emphasis on the development of heavy industrial sector at the expense of consumer goods. In light of rising consumer demand, however, the 1974 budget has been drawn so that increased revenue will be expended on improving "public welfare." While production in light and food industries increased by 9.1 percent in 1973, there were shortages in a number of consumer items such as cotton and woolen fabrics and knitwear, footwear, furniture, electrical appliances and certain food items including meat and meat products. Retail turnover increased by 8.6 percent in 1973, a figure which surpasses by 1.6 percent the planned total.

Recent worldwide shortages of petroleum and raw materials have had a relatively small effect on the Bulgarian economy as compared with some other European countries. Trade agreements with the USSR supply Bulgaria with roughly 70 percent of its petroleum needs through 1975.

Bulgaria has large reserves of low-grade coal. It is also actively searching for assistance in exploring the potential of oil fields in the Danubian plain north of Pleven and off the Black Sea coastline.

Bulgaria's foreign trade with the CEMA community increased by 12.7 percent in 1973 and is planned to increase 17 percent in 1974. Its foreign trade goal remains to increase economic integration with the Soviet Union and the other countries of the socialist community. Presently Bulgaria's trade with CEMA countries is between 78-80 percent of its total foreign trade. Its export production has moved away from agriculture goods and towards a "specialization" in industrial production, particularly machine building and metal processing. Last year these two areas of specialization constituted 37.4 percent of the production growth rate in state industry as a whole, although their share of Bulgaria's total industrial production is only 23 percent.

Tourism becomes important

Bulgaria's tourist industry continues to boom and has become an important source of hard currency. Last year over 3.2 million foreigners visited Bulgaria, an increase of approximately 7 percent, and some 1,000 of these are estimated to come from Western countries, primarily West Germany. Bulgaria recently signed a free trade agreement with Finland eliminating trade barriers between the two countries, reportedly the first of its kind between a socialist and a non-socialist country.

In 1973 U.S.-Bulgarian trade approached $11 million, a significant increase over the $6.4 million in 1972. As in previous years, U.S. exports ($6.5 million) were greater than imports ($4.5 million), causing some concern in Bulgaria since it strives to maintain balanced trade accounts. In 1973 as in the past, too, the United States remains a relatively insignificant trading partner, and total U.S.-Bulgarian foreign trade constituted only 0.2 percent of Bulgaria's total foreign trade.

Unlike past years, however, the climate for trade between the United States and Bulgaria has significantly improved. In April Secretary of Commerce Frederick B. Dent visited Sofia to hold high level talks with Bulgarian officials, the first such visit by a cabinet-level official since 1963. The exchange of visits between Presidents Nixon and Brezhnev and the initialing of an agreement between the U.S. and Bulgarian Chambers of Commerce are also significant factors in the improved political climate for increased trade relations.

With this improved climate, Bulgaria has begun to express considerable interest in technologically sophisticated U.S. machinery and equipment. In recent months U.S. businessmen have negotiated with Bulgarian officials over a wide variety of areas including computer hardware, steel mills, shipyards, cement factories, canning factories and petroleum extraction. Bulgaria is also interested in labor-saving machinery of any sort to counteract the present labor shortages.

Conservative policies

Bulgaria is one of the most conservative of the CEMA countries. Consequently, direct foreign investment remains illegal, and Western firms are not allowed to station representatives in the country. Bulgaria desires licensing and joint production arrangements. Presumedly insufficient hard currency reserves give preference to those projects for which repayment can be made at least in part by production. To hasten the development of its internal economy Bulgaria prefers to purchase complete manufacturing processes rather than the products themselves, i.e., it would prefer to purchase a computer assembly plant than the computers themselves. It is also quite interested in exploring the possibility of third-country joint cooperative ventures.

There remain a number of artificial barriers restricting increased U.S.-Bulgarian trade. Lack of MFN status affects a number of potential exports to the United States, particularly tobacco and other agricultural products. In addition, Bulgaria is ineligible to receive U.S. Government credits until an agreement has been reached on defaulted bonds issued by the Kingdom of Bulgaria and presently held by U.S. citizens. The lack of U.S. Government credits puts U.S. firms at a competitive disadvantage with those firms from other Western countries, while the lack of MFN status inhibits Bulgarian imports, making the balanced trade accounts which Bulgaria desires even more difficult to attain.

The willingness of Bulgarian authorities to entertain proposals from U.S. business firms is readily apparent. The challenge is there for the U.S. businessmen willing to investigate trade possibilities in the relatively small but unexplored Bulgarian market, or beyond that to cooperate with Bulgaria in third-country ventures.

Ireland Keeps In Economic Step: Slower Growth, Faster Inflation

After a near record performance in 1973, with real GNP up by 7 percent, prospects for the Irish economy, like most other economies in the world, are not as good in 1974. According to the U.S. Embassy in Dublin, real growth will probably reach 4-5 percent with inflation rising from 11.4 percent to 13-15 percent, almost entirely resulting from increased oil prices. A new enhanced wage package and an expansionary budget will also add to price rises, but the government prefers expansion to deflation.

EEC membership has provided both cash benefits and a welcome broadening of Irish commercial horizons; however, there is considerable concern among knowledgeable Irishmen about the current strains the Community is undergoing. Thus far, the violence in Northern Ireland has not had any significant effect on industrial development south of the border. With a view toward more even distribution of growing prosperity, the Irish Government has introduced proposals for a new capital taxation structure.

Observers of the Irish economy have indicated concern that the growth rate will decline this year. Before the budget was announced in April, advocates of expansionary policies, including the OECD, the National Economic and Social Council, the Economic and Social Research Institute, and the government itself, believed the economy would grow by only 2.75-4.0 percent without application of additional stimulation. The government estimates that the budget will add another 1 percent boost to the economy, bringing growth for the year to about 5 percent; the Central Bank is less sanguine, believing the budget will contribute only a half percent, for a total of 4.5 percent.

Significant developments will take place in the energy area over the next few years. The Electricity Supply Board (ESB) is moving ahead with plans to construct a light water reactor nuclear generating plant, costing $350-500 million, at Carnsore Point in County Wexford. The ESB and the state-sponsored Nitrigen Eireann Teoranta fertilizer company are in active and probably conclusive negotiations with Marathon Oil for sale and utilization of a small but rich gas strike made in the Celtic Sea off Cork. A number of oil refinery complexes are in various stages of planning and discussion, including a $135 million oil refinery at Whiddy Island for which Irish Hydro Carbon (allied with APCO) received Irish Government approval in principle last February and a very large refinery/petro-chemical complex being considered by Shaheen Natural Resources (N.Y.) also for the Bantry area.

In transportation, the Irish Government has approved in principle the building of an eight-lane motorway bridge costing $45 million (at 1971 prices) across the Liffey River at Dublin. At the same time the government also approved a $30 million injection into Dublin's rail commuter services; the projects are still in the planning stages and will take eight years to complete.

To improve the heavily overloaded telephone system, the Irish Government will spend some $385 million over the next five years, $80 million in the current year. Part of the capital has been borrowed from the European Investment Bank. As well, there is active consideration being given to establishment of a second television channel for the Republic. All the above projects provide important opportunities for major American enterprise and sales.

Unfortunately, the U.S. share of the Irish market has been declining steadily over the past three years and dropped below 7 percent in 1973. Irish end-users say that American exporters should devote more personal attention to the Irish market, appoint agents, make their prices competitive, speed up delivery, and provide timely and efficient after-sales service and spare parts.

The climate for foreign investment in Ireland remains encouraging. As noted earlier, the violence in Northern Ireland has not had a significant effect on industry in the Republic. Attractions to investment include: 1) inducements such as grants and tax exemption on export profits; 2) Ireland's position as a springboard for sales (eventually duty-free) to the rest of the European Community; 3) still relatively low Irish wage scales; 4) relative industrial stability resulting from centralized collective bargaining.

Some major companies which are taking advantage of these factors include: Burlington Industries, which plans to set up two factories at a cost of $50 million; Alcan, which is to build a $225 million smelter in the Shannon estuary; Du Pont, which is considering Cork as a possible site for large chemical plants costing $100 million; and Mitsui, which will build an electrolytic manganese dioxide plant in Cork.

While foreign investment plays a major role in Irish development calculations, only one-third of Irish business is foreign-owned, according to a Confederation of Irish Industry estimate. There is concern that a large proportion of the revenue of foreign grant-aided industry flows out of Ireland in the form of purchases of imported raw materials and remittances abroad, but the so-called "multinationals" do not have a bad image in Ireland.

Togo Presents A Mixed Trade Picture

The predominantly agricultural Togolese economy today presents a mixed picture of declining agricultural output contrasted with gains in the small but growing industrial base, according to a report from the U.S. Embassy in Lome.

Commercial activity has not picked up substantially from its 1972 doldrums, although construction is beginning to show new signs of life. Togo continues to boast political and fiscal stability, and as a member of the West African Monetary Union enjoys a sound currency within the franc zone.

Although trade with the United States fell in 1973, the prospects for increased American exports to Togo, already recording a four to one trade advantage, are good due primarily to Togo's brighter foreign exchange outlook.

Rising phosphate prices will permit the Togolese Government the option of accelerating the pace of its lagging Five-Year Development Plan. This would, in turn, make the diminutive local market more attractive to U.S. exporters. Of particular interest will be a $12.5 million, World Bank-financed road project aimed at repaving an 82-kilometer section from Blitta to Sokode on the main north-south axis, plus improving a number of secondary roads.

Traditionally, certain categories of American projects have sold very well locally. Heavy road building machinery, popularized in Togo by the A.I.D.-supported Regional Road Maintenance and Training Center, enjoys a good reputation. The Training Center itself, which provides instruction in the use of heavy road building equipment to students of the Entente countries (Dahomey, Ivory Coast, Niger, Togo, and Upper Volta), will probably continue to be an important buyer of American products after this A.I.D. assistance ends in 1975. In the more generalized area of heavy equipment, the United States ranks first as a supplier of tractors, and third, behind France and West Germany, in the sale of machinery. Electrical apparatus—especially airconditioning units and generators, raw and processed tobacco, frozen and miscellaneous foodstuffs, and used clothing are U.S. exports that register consistent sales.

New opportunities may open

New opportunities may open up in the fields of scientific research and laboratory equipment which would go into a planned Natural Resources Research and Development Center. Togo has recently received a $300,000 Export-Import Bank loan for a feasibility study of the need for a $2.5 million scientific center for resource development. EXIM financing is not new to Togo;

the government has already benefited from a $1.2 million loan and loan guarantee for the purchase of electrical materials in 1970 and a $128,000 loan for an agro-industrial feasibility study. In spite of the dim agricultural picture during the past few years, the Bank considers Togo to be credit worthy and predicts an upturn in the country's foreign exchange reserves.

Primed by a concessionary loan from the United States Agency for International Development, the Togolese Government's program to encourage the development of small enterprises has been given a needed boost. The U.S. A.I.D. credit, including some technical assistance, is actually a direct $7.5 million loan to the Council of the Entente, which in turn reloans the funds to the member nations' development banks. In August 1973, the Banque Togolaise de Devellopement received the first tranche of a $1 million allotment. These funds will be lent to Togolese entrepreneurs at low interest rates which should further improve the U.S. export position in Togo, since the loan monies are tied to procurement of American or African-made products.

Togo exports very little to the United States. However, for the first time in several years, U.S. food processors imported a substantial amount of Togolese coffee, 2,500 metric tons valued at $1 million, a considerable increase over the 1972 level of $26,000.

Outlook for investment

Investment opportunities in Togo are admittedly slight. Following the government's unprecedented action in nationalizing the phosphate industry, in which a U.S. company, W. R. Grace, had a 30 percent interest, approaches should be made with due caution. Nevertheless, possibilities do exist, and the government continues to maintain an open door foreign investment policy.

While the Togolese economy will be rejuvenated by increased revenues due to higher phosphate prices, a significant share of the development burden will continue to depend on private external sources. Togo's liberal investment code, offering up to 10-year customs duty and tax exonerations plus the right of repatriation of profits, remains in effect as an important inducement to foreign investors.

Best areas for investment are in the agro-industrial fields, where with proper controls, irrigation systems, and mechanized farming, the vagaries of the temperamental agricultural conditions could be minimized and profitable output sustained. Specific projects ripe for investors inquiries include tobacco cultivation, processing of essential vegetable oils, sugar cane production and refining. Detailed information may be obtained from the Ministry of Plan in Lome. The complete range of OPIC investment services including political risk insurance, is available to interested businessmen.

Paraguay Economy Improves But New Problems Materialize

Economic gains that Paraguay made last year offer some encouraging possibilities, according to the U.S. Embassy in Asuncion, but the Embassy cautions that short-term sacrifices were necessary to capitalize on these opportunities and a growing number of medium-term economic problems are now apparent.

The Embassy adds that Paraguay's developing agriculture and infrastructure programs will continue to offer increased opportunities for the sale of agricultural, food processing, and construction and road-building equipment. The Government has a positive attitude toward foreign investment in agriculture and light industry and offers equal incentives to domestic and foreign investors.

The rate of real growth of Paraguay's economy improved slightly during 1973, with a constant dollar increase in GNP of 5.8 percent (5.3 percent in 1972). Exports increased dramatically by 47 percent, reaching a total of $126.9 million, while imports increased by 48 percent, to $121.9 million. Meat exports continued to dominate Paraguay's export list, with a value of $40.5 million, 31.8 percent of total exports.

Even though U.S exports to Paraguay rose by 27 percent to a total of $17.3 million in 1973, export value honors were lost to Argentina which, through a generous government-sponsored program of supplier credits, achieved a 155 percent export increase to a level of $27.5 million.

Emerging economic problems referred to earlier include:

- The inflation rate has accelerated sharply since the last half of 1973, and continues unchecked;
- Record-breaking prices for Paraguay's principal agricultural exports may prove to be transistory, in contrast to a more permanent upward trend in the prices of Paraguay's essential imports of raw materials and manufactured goods;
- Substantial production increases of agricultural commodities which constitute a significant segment of Paraguay's export trade appear to have been achieved, but at the expense of diminished production of a number of other traditional commodities;
- There are growing indications that the Paraguayan Government's improved 1973 fiscal performance, in which there was a substantial reduction in the deficit, was accomplished through sharp restrictions on expenditures for capital development and a policy of maintaining the freeze on all civil servant salaries. Government salaries have remained unchanged for the past three years, despite sharply increased living costs and a more than 50 percent increase in the minimum wage for the private sector. This situation may predicate repercussions which sacrifice administrative efficiency and coordination.

During 1973, treaties were signed with Brazil and Argentina to build the Itaipu and Yacreta-Apipe hydroelectric projects. Progress on these projects during 1974 is expected to be restricted primarily to, for Itaipu, solicitation of bids for comprehensive design, and undertaking of diversion canal excavation, and for Yacreta, selection of a comprehensive design proposal. The Governments of Argentina and Paraguay recently jointly called for bids for preparation of a multiphase prefeasibility, feasibility, and comprehensive design study for a third large hydroelectric project known as Corpus, approximately halfway in geographic location (and anticipated size) between the larger Itaipu and the smaller Yacreta-Apipe projects.

More than $7 billion will be spent on these three projects during the next 15 years, assuming feasibility of the Corpus project is confirmed by the studies. The projects will offer unprecedented opportunities to U.S. engineering and consulting firms, and manufacturers of hydroelectric generation and transmission equipment and construction equipment of all types.

Competition is tough

Although the beneficial effects of the U.S. dollar devaluations in 1971 and 1973 have been eroded somewhat by recent international currency readjustments, U.S. products appear to be competitively priced as compared to other major exporters. Working to the disadvantage of the United States, however, is the fact that products of German, Dutch and Italian firms historically are well received by Paraguayan consumers, in part because of influences arising from immigration into Paraguay from those countries. In addition, the geographic proximity (and recent officially sponsored supplier credit programs) of Argentina and Brazil create real trade opportunity advantages for those countries in competition with the United States for the Paraguayan market.

Paraguayan private sector markets will continue to offer opportunities for American exporters (and their South American subsidiaries) in such products as electric and electronics equipment, certain types of agricultural and construction equipment, transportation equipment and accessories, and fabricated metal products. However, these traditional markets are overshadowed by the potential represented by the major hydroelectric projects described earlier. Many U.S. manufacturers and engineering and construction firms will have an advan-

tage in competition for contracts associated with these projects because of their experience, advanced methods and technology, planning and coordination capabilities and personnel resources.

The investment climate in Paraguay is good and the government continues to encourage foreign investors, particularly in sectors considered basic to expansion of exports. Incentives under the investment law are offered equally to both foreign and domestic investors. Priority industries for which capital is being sought include cattle raising and meat-packing, animal hide processing, food processing and canning, agricultural chemicals, timber and finished wood products, and marble and ceramic industries.

Transition Period Opens For Laos

A new Provisional Government of National Union formed in Laos this spring brings the opposing Lao political factions together again after 11 years of severe military conflict. This significant step along the road to national reconciliation suggests that changes are likely to take place in the political, social, and economic spheres in Laos in the future.

In a peacetime atmosphere, continues the U.S. Embassy in Vientiane, Laos will be able to turn its attention more fully to economic development. Although many Lao businessmen believe that under a more efficient peacetime administration local business may be somewhat less profitable as tax collections increase and corruption is reduced, numerous opportunities hitherto precluded by the war situation can now be examined and developed. Thorough surveys of Lao mineral resources such as tin, iron, and potash could result in the discovery of new commercially exploitable deposits, bringing about increased foreign investment to develop these resources and rapid improvement in the Lao export-import balance. The opening of several new and modern factories in the past year, and the planning and construction of various others, reflects confidence in the economic future of Laos in spite of current uncertainties.

In addition, the new factories and (hopefully) growing agricultural sector income represent an expanding market for American machinery and supplies of essential materials and consumer goods.

Among the more important discernible trends in the past year was the gradual return of refugees to their former homes, indicating a growing degree of self-sufficiency among the agrarian population after very high levels of welfare support required during the period of wartime dislocation.

Most trade outside urban areas continues to be conducted on barter terms, however, and the agricultural sector is still producing mainly at the subsistence level. Among the more important economic activities, rice and lumber production increased during 1973 and tin production continued steady. Other marketed production in Laos was still insignificant in size in 1973.

Industry in Laos expanded significantly in 1973 with the opening of four new factories, and several more are planned. Those which began operations during the year were a $3.5 million brewery and Coca-Cola bottling plant using mostly French equipment, a Pepsi-Cola bottling plant using American equipment, a plywood factory equipped from Taiwan, and a steel roofing sheet factory with technical assistance, equipment, and financing from Japan. In addition, a coal mine began operations early in 1974 near Van Vieng. Expected to be completed during the current year are a mint plant, a wood flooring plant, slaughterhouse and a fibro-cement factory.

In addition to replacing traditional imports, the new factories have a limited capacity for export production. Plywood is already being exported, and both beer and roofing sheets may be sold in northeast Thailand in the near future. The new factories enjoy liberal benefits under Lao investment laws, including tax breaks and in some cases protection against competing imports.

It is anticipated that during 1974 work will commence on the second phase of the Nam Ngum Hydropower Project. A multilateral fund of nine donors will finance the estimated project cost of $24.4 million, with the United States contributing $5 million.

Lao imports grew rapidly in 1973, with officially recorded increases of 70 percent in commercial and 5 percent in non-commercial imports in the first three-quarters of the year.

Behind the import rise

Factors influencing the extraordinary recorded growth in commercial imports may include: the higher unit cost of most imports; foreign-financed imports of industrial equipment and raw materials for the many new factories which started up in 1973; and rice import requirements due to the 1972 harvest deficit.

In 1973 Japanese exports to Laos rose 125 percent (U.S. dollar value), U.S. exports rose about 13 percent, and Thai exports (7 months) rose 31.5 percent.

American business should be able to participate on a par with other Western countries in the peacetime development of the Lao economy. In the next year or two there may be increased imports from Communist nations, but they are not likely to claim a major share of the Lao market. U.S. producers should be able to maintain their position and gradually expand sales on the basis of quality and durability. Product simplicity and adequacy of service facilities will also improve sales.

Metric Dimensions Required For Exports To European Communities By 1978

By 1978, U.S. exporters to the European Communities (EC) will be required to indicate dimensions in metric units.

The nine EC member states are in the process of implementing EC Directive 71/354, on units of measure, which was originally adopted in October 1971. Under the Directive, member states will harmonize their laws, regulations and administrative provisions regarding measuring instruments and methods of metrological control. To develop identical units of measurement, particularly their names, symbols and use, member states were given five years to implement the Directive.

The Directive establishes a three-way division of measurement units: Standard International (metric) units whose use is definitively authorized throughout the Common Market; measurement units whose continued use will be reviewed by 1978; and measurement units which will be phased out by 1978. Items in the last division may be dual-dimensioned with Standard International units until 1978 as long as they do not create confusion and member states are willing to accept them.

Due to British entry into the European Communities in January 1973, the original Directive has been amended to take account of the British Imperial System (BIS) of measurements, largely similar to those in use in the United States. While dual dimensioning in BIS and Standard International units will be temporarily permitted, the EC will decide by 1976 which British, i.e., nonmetric, units will be acceptable throughout the Community.

Dual dimensioning

The acceptability of dual dimensioning between BIS and Standard International units will depend upon whether it presents the risk of confusion. Internal components and fittings do not have to meet metric requirements but the scale on a measuring instrument, for example, must be in metric measurements. Replacement parts and accessories imported after 1978 must conform to the requirements.

U.S. firms interested in obtaining copies of the Directive and its amendment should write to the European Regional Affairs and Trade Regulations Staff, Room 4002, BIC, U.S. Department of Commerce, Washington, D.C. 20230.

International Business Reports

The Fortunes of the West: The Future of the Atlantic Nations. 1973. By Theodore Geiger. Published by the National Planning Association. 314pp. $10.

Discusses new realities now shaping transatlantic relationships and charts what the author believes are the more and the less probable ways in which U.S. and European policy makers are likely to deal with resulting economic and political problems in the years ahead. In a *Looking Ahead* supplement, Geiger updates his analyses and projections to take account of the effects of the world energy crisis and related developments.

Write: National Planning Association, Distribution Department, 1606 New Hampshire Ave., NW., Washington, D.C. 20009.

Toward a New International Economic System: A joint Japanese-American View Published by the Committee for Economic Development. 64pp. $2 paper, $3.50 hardbound.

This policy statement of the Research and Policy Committee of the Committee for Economic Development in the United States and the Japan Committee for Economic Development was issued simultaneously here and in Japan along with special subcommittee studies in which each panel assayed the economy of the other nation.

Emphasizes the need to provide maximum freedom and cooperation in international transactions in the process of replacing economic rules and procedures that have become inadequate in the wake of "vast historical" transformations that have been taking place in the international economic system. Since World War II, the report observes, the world has evolved into a complex "multipolar global political structure" with highly integrated national economies that must cope with a much stronger role of multinational enterprise and new demands from developing nations.

Write: Committee for Economic Development, 477 Madison Ave., New York, N.Y. 10022.

Economic Blocs and U.S. Foreign Policy. By Ernest H. Preeg. Published by the National Planning Association. 198pp. $3.50 paper, $7.95 hardbound.

The author finds that conflicts among the United States, the European Community and Japan reflect the basic trends toward "tripolarization" of the world economy around these three major industrial centers, as well as other profound changes within developed and developing nations and in the nature of world politics and economics. The study analyzes these developments as they affect international monetary arrangements, trade policies, energy problems, investment issues, the activities of multinational companies, and other international economic relationships.

Although primarily concerned with the difficulties confronting the United States, the European Community and Japan, Preeg also deals with the implications of international developments for Asian, African and Latin American nations and for relationships with the Soviet Union, China and other communist states.

Write: National Planning Association, 1606 New Hampshire Ave., NW., Washington, D.C. 20009.

World Instrument Markets, 75 pp., $95; World Markets for Farm Machinery, 60pp., $95; World Market for Pumps & Compressors, 112 pp., $125; World Biomedical Equipment Markets, 55pp., $125; The Position of Japan in the American & World Sporting Goods Markets, 51pp., $175. Published by Morton Research Corp.

The publisher describes these World Market Reports as designed to help U.S. producers increase exports and improve and expand existing positions in selected countries and products. They provide "significant marketing facts, important shifts and trends, world leads, export possibilities, all kinds of licensing and distribution arrangements, and vital domestic and world developments."

The Japan report, according to the publisher, provides statistical evidence surrounding Japan's entry into the sporting goods market as well as prospects for further growth, and is designed to help U.S. producers understand and recognize the extent of Japanese competition.

Write: The Morton Research Corp., 1745 Merrick Ave., Merrick, N.Y. 11566.

The World Bank Group in the Americas. 1974 edition.

This booklet, available in both English and Spanish, details the World Bank Group's activities in each of the 22 Latin American and Carribbean member countries. It concentrates on activities of the World Bank and its affiliate, the International Development Association.

Write: International Bank for Reconstruction and Development, 1818 H St. NW., Washington, D.C. 20433.

Economic Survey for the United States. July. Published by the Organization for Economic Cooperation and Development. 47pp. $1.25.

Declining activity and accelerating inflation, the two fundamental economic problems facing the United States in early 1974, are the focus of this Survey. Part I outlines the main features of the slowdown from the first quarter of 1973 to the first quarter of 1974 and discusses the factors behind the marked strengthening of the external position. Part II analyses the recent inflation problem and attempts an appraisal of the 30-month experiment with wage and price controls. Part III examines the fiscal and monetary policy stance pursued since the beginning of 1973 and discusses the probable course of policy over the next 12 months. The economic outlook is presented in Part IV, and Part V offers some conclusions that emerge from the analysis of the Survey.

Write: OECD Publications Center, Suite 1207, 1750 Pennsylvania Ave., NW., Washington, D.C. 20006.

Chile Issues New Investment Statute

The Chilean Government has issued a new foreign investment statute as Decree Law 600. Major points are:

- New foreign investors must sign contracts with the newly created Committee for Foreign Investment which authorizes investments. Contracts will stipulate regulations governing each investment, and will normally have a ten-year life span. However, the Committee can grant 20-year contracts and beyond, if justified.
- Contracts will stipulate exchange rate, repatriation, tax and other rules applying to each investment. Those rules will not discriminate against the foreign investment as compared with the treatment of national investment.
- Guarantees may be given to investors in natural resources stipulating that franchises and taxes will not be modified in the future.
- Foreign investment may be authorized in existing national enterprises, if considered in the national interest, up to 20 percent of the existing enterprises' capital and reserves. A higher percentage may be authorized in specific cases.
- Foreign investors wishing to take advantage of the benefits to be derived from Chile's membership in the Andean Common Market and Latin American Free Trade Association must comply with all rules which are validly obligatory in Chile and emanate from Chile's commitments to these entities.

Copies of the foreign investment statute (in Spanish) are available, on a 10-day loan basis, from the Latin America Division, Room 4039, Bureau of International Commerce, Washington, D.C. 20230.

Fight Souvenirs, Materials Require Zaire's Approval

The Zairian Comissioner of National Orientation has announced, in connection with the Sept. 25 George Foreman-Mohammed Ali heavyweight championship fight to be held in Kinshasa, that all foreign and domestic commercial enterprises involved in the fabrication, printing, sale, circulation and distribution within Zaire of all souvenir items and promotional materials having to do with the fight are required to receive prior authorization from the Government of Zaire. Violators of the regulation could receive up to one year in prison.

Worldwide Business Opportunities

International trade specialists in the Department of Commerce and Foreign Service Officers in the U.S. Embassies and Consulates around the world are continually developing specific commercial opportunities through which American companies can find buyers, agents, partners or investors abroad. One of the major means for communicating these opportunities promptly and accurately to the U.S. business community is through the columns of this magazine.

The section that follows presents details about licensing and joint venture proposals, opportunities to sell to foreign enterprises and appoint agents, and details on major construction and expansion projects.

Licensing, Investment Abroad

0100, 0200—SURINAM—American investors and suppliers are sought to participate in **commercial farming, cattle ranching and minerals prospecting** in southern part of country. Additional information available in Dutch. Hans van Praag, Vice Consul of the Netherlands, Ibiza, Balearic Islands, Spain. P-74474.

2061, 2063—GREECE—Recently established firm is interested in a licensing or joint venture arrangement to process **molasses.** Firm wishes to extract vitamin C and other by-products to be used in pharmaceutical industry. Company estimates project cost at $800,000. Foreign Investment Services Staff, Room 4021, U.S. Department of Commerce, Washington, D.C. 20230. WTDR. P-74442. OPIC.

2844, 2834, 2841, 2870—SWITZERLAND—Seeks to represent, distribute and manufacture under license U.S. **cosmetics, pharmaceuticals, household preparations and agricultural fertilizers.** Established holding company, comprised of three affiliated companies in above product lines, has modern laboratories, manufacturing, mixing, and packaging facilities. Principal sales territory Switzerland with agricultural chemical and supply outlets in Federal Republic of Germany. Walter P. Eggimann, Vice Chairman, Eggimann Holding, Seestr, 135, 8800 Thalwil, Switzerland. P-74463.

2865—KOREA—Seeks joint venture or licensing agreement to expand line of production of dyestuffs, particularly **high quality disperse and vat dyestuffs.** Also seeks data on U.S. manufactured equipment for new dyestuff plant, part of a $10 million expansion. Construction scheduled to begin in September on new plant, which will expand current production of 4,500 metric tons of dyestuffs per year. Firm is subsidiary of trading company with interests in real estate, chemicals and plastics. Firm claims to have active representatives in 16 countries. Cho, Chang-Whan, President, RIFA Industrial Co., Ltd., C.P.O. Box 2360, Seoul 100, Korea. Cables: RIFACO, Seoul; telephone 63-2431. WTDR. P-74482. OPIC.

2869, 2873—GERMANY—Visiting representatives seek to establish contacts with American firms interested in providing know-how and undertake production and marketing of **ethylene, acetylene, aromatics such as benzene, PVC, polyethylene, polystyrene, fertilizers from gas such as urea and ammonium.** Firm also has offices in Abu Dhabi and Lebanon. Representatives will be in the U.S. Aug. 18-24. Interested parties may write or call the Foreign Investment Services Staff, Room 4021, U.S. Department of Commerce, Washington, D.C. 20230; 202-967-3786. P-74475.

2869 — VENEZUELA — Government owned Venezuelan Institute for Petrochemicals seeks collaboration in forming mixed-capital firms in association with the Institute, to produce **propylene oxide, styrene, styrene-butadiene, metanon, isopropanol-aceton, propiyen-glycol methyl-chloroform and similar products.** Interested companies should send to Venezuelan Institute for Petrochemicals, Apartado 2066, Caracas, Venezuela, a letter before Aug. 31 expressing thir interest, products they wish to make, references, financial statement, etc. P-74476.

2879—SAUDI ARABIA—Large firms seeks to estaiblsh joint venture arrangement to obtain specialized skills and know-how in **pest control.** As an alternative, firm would be willing to send someone to the U.S. for training at a technical school or with a professional pest control business under a special training contract. Established in 1964; produces aluminum profiles, bars, doors, windows and accessories. Annual sales, about $1 million. Fallah Ben Jabr, Dy. General Manager of Ben Jabr Establishment for Aluminum Manufacture, P.O. Box 1198, Jidda, Saudi Arabia. P-74483.

3079—UNITED KINGDOM—Private limited liability company estabilshed in 1903 seeks license to manufacture or assemble **houseware or leisure products.** Presently produces shower curtains and roller window blinds which it distributes throughout the United Kingdom and Common Market countries. Factory, in Paisley, Scotland, covers 20,000 square feet. Robert McNeill, Chairman, J. W. Pickles & Co., Ltd., 62 Espedain St., Paisley, Scotland. P-74485.

3143—VENEZUELA—Firm is seeking a joint venture arrangement to establish a plant to manufacture **boats for military use and oil field work, and sporting shoes.** Firm is small manufacturer of disinfectants, cleaning and sanitation preparations, paints and fireworks. U.S. partner to share 25 percent to 30 percent of capital. Konstantin Trajkovich Moravac, President, Fabricas Qimicas Ayacucho C.A., Aptdo. 6855 De Carmelitas, Edificio Santiago De Leon, Oficina 81, Avenida Casanova, Caracas, Venezuela. P-74446.

3429, 3499—ISRAEL—Seeks licence to manufacture **wheels and casters, institutional and industrial type, from 1½ to 10-inch diameter, of steel.** Plant would be operated by Kibbutz Eyal, 15 miles northeast of Tel Aviv. Established in 1966, Kibbutz has 120 adult members, adequate means to finance the project, and can call on highly skilled engineers and technicians for work force. Reportedly, local demand for high quality wheels and casters exceeds supply. Kibbutz is interested in exporting to Europe, Africa, or Asia. Contact the Kibbutz representative, A. Kranzberg, Consulting Engineer, Know-How & Planning Systems MBD Ltd., POB 7078, Haifa, Israel. P-74480. OPIC.

3500—GERMANY—Seeks license to manufacture **medium to heavy mechanical machinery.** Firm has capability to produce components and special parts from design. Presently produces special machinery such as hydraulic working lifts, conveyor belts and special gears. Maschinenfabrik Nordwig, Harburger Scholsstrasse 23, 21 Hamburg 90, Germany. P-74447.

3523—ARGENTINA—Seeks licenses to manufacture **portable grain driers** of between 2 and 10 tons per hour drying capacity for sorghum, corn, wheat and rice. Businessman currently has a light metal working business, is forming new company in conjunction with grain driers sales organization to manufacture the driers. Interested firms should send product literature and terms and conditions of license agreement to Carlos Alberto Carozzi, Luro y Obligado, Glew, Pica. de Buenos Aires, Argentina. WTDR. P-74481.

3530—SWITZERLAND—Well equipped company with 150 employees in the field of industrial apparatus, gardening and construction machinery and metal fabrication seeks licenses. Wants to manufacture or assemble for a U.S. exporter **small to medium sized agricultural and gardening machinery, equipment for road construction as well as special utility vehicles and craft including special items for leisure time application like light metal boats.** Also interested in **sheetmetal structures and prefab office, commercial and industrial buildings and warehouses.** Company has excellent reputation and financial standing. Walter Handelsmann, Karl Mueller AG, 9325 Roggwil, Switzerland. Copies of firm's product brochure are available from the Foreign Investment Services Staff, Room 4021, U.S. Department of Commerce, Washington, D.C. 20230. P-74477.

3559—SWITZERLAND—Seeks licenses and processes to produce equipment for (1) **solid waste recirculation to include operations such as sorting of glass and metal before incineration;** (2) **treatment and incineration of slag which cannot be handled under normal processes;** and (3) **for production of energy from solid waste.** Firm is involved in solid waste incineration and disposal of special industrial wastes. It has developed novel types of combined waste incineration plants which have found excellent acceptance throughout Europe. It cooperates closely with a large German concern which has major production facilities. W. E. Meier, Ofenbau-und Feuerungstechnik AG (OFAG), Dufourstr. 90, 8034 Zurich, Switzerland. P-74478. Copies of firm's product brochures are available from Foreign Investment Services Staff, Room 4021, U.S. Department of Commerce, Washington, D.C. 20230.

3579—UNITED KINGDOM — Manufacturer of aerials, cable TV systems, curtain rail systems, garden furniture and electronic components seeks licenses. Wants to make **products compatible with existing lines with particular emphasis on electro-mechanical components for electronics industry.** Company reports annual sales of $14 million and employs 690. D. Mather, Technical Director, phone, Aylesbury 82511; telex, 83666; cable, Antiference Aylesbury, England. WTDR. P-74452.

3585—JAPAN—Manufacturing rights for **industrial and commercial refrigeration equipment** sought by leading Japanese firm. Company makes textile machinery, hydraulic equipment and machine tools. Operates five plants and employs around 2,500. Company has ample space and financial and personnel resources for expansion. S. Ueno, Senior Staff Member, Patent Department, Teijin Ltd., Iino Bldg., 1-1, Uchisaiwai-cho 2-chome, Chiyoda-ku, Tokyo 100, Japan. P-74453.

3589—ARGENTINA—Seeks license to produce **sewage and dehydrating equipment.** Particularly interested in dehydrating equipment capable of handling 1,000 to 5,000 liters per hour of mud flowing from primary sewage mud depurating plants, with 2 percent solid content. Firm is major manufacturer and distribu-

tor of water treatment equipment and sewage purification units. Guillermo Stinco, Vice President, Roberto A. Stinco S.A., Bahia Blanca 2356, Buenos Aires, Argentina. WTDR. P-74454.

3629—INDIA—Seeks a license to manufacture **high voltage electrolytic and plastic film capacitors.** Firm plans to establish a facility at Bombay's Santa Cruz Electronics Export Processing Zone. Would produce 1 million electrolytic and 20 million plastic film capacitors including metallized film annually for export. Indian company is large manufacturer of aluminum conductors for electrical power transmission, transformers, industrial and transformer coils. V. S. Ramanand, General Manager, Electronics Division, Power Cables Pvt. Ltd. (PCPL), Post Bag No. 3, Dharmsinh Park, National Highway No. 8, Nadiad 387 001, Gujarat, India. WTDR. P-74457. OPIC.

3641—INDIA—Manufacturing rights for **halogen lamps** for automotive, street lighting and photographic applications. Plans call for production of 250,000 lamps annually. Estimated cost of the project is $1 million. Indian firm is leading producer of incandescent electric lamps primarily for automotive industry. Halogen lamps are not presently produced in India. P. Sharan Gupta, Managing Director, Auto Lamps Lt. (ALL), 7-Alinpur Road, Dehli-110006, India. P-74458. OPIC.

3650—UNITED KINGDOM—A major international British firm seeks licenses, joint ventures or other business agreements covering **audio visual products.** Company is particularly intrested in production of **video monitoring equipment.** For further information, write: U.S. Embassy, Grosvenor Square, London W.1., England, attention Ass't Commercial Attache, H. E. Mattox. P-74486.

3679—UNITED KINGDOM—Seeks licensing arrangement to manufacture **solid state components and metal film resistors** compatible with present line. Firm at present manufactures wirewound components including precision wirewound resistors, reed relays and special coil assemblies. Firm established since 1940, employs 360 persons and has annual sales of $2.4 million. Electrothermal Engineering Ltd., 411-419 Sutton Road, Southend-on-Sea, Essex, England. WTDR. P-74479.

3732—UNITED KINGDOM—Seeking licensing agreements with U.S. companies to produce **fiberglass boats from molds supplied.** Firm is an American-owned British company with ten branches throughout the world. Established in 1966, company represents five U.S. companies for fiberglass boats and boating supplies. In expanding activities, firm is in process of acquiring British fiberglass boat company. Firm specifically indicated possibility of casting fiberglass boats from out-dated molds that become available in the United States. Firm is also seeking to augment its range of products through representation of U.S. manufacturers of fiberglass cruisers. Gerald Malmed, Managing Director, Flamingo International 72-76, Fleet St., London EC4Y 1BQ; cables: GOAFRO London, telex 24731. P-74421.

3821—BAHAMAS — Seeks joint venture to produce **small portable blood pressure indicators and ampoule openers.** The small Nassau firm is a distributor of several products. Was established in 1972, rents warehouse and office space. R. Burgzorg, Managing Proprietor, Bahama World Traders; P.O. Box N-8055, Nassau, Bahamas. Telephone (809) 325-3355. P-74417.

3944—JAMAICA—Newly formed company seeks joint venture arrangement with a U.S. firm experienced in manufacturing **wooden toys.** Firm is interested in obtaining possible financing, technology, and new or used manufacturing equipment in return for share of equity of company up to 49 percent. Presently manufactures 12 lines of wooden toys ranging from small trains to hobby horses. For additional information, write: Foreign Investment Services Staff, Room 4021, U.S. Department of Commerce, Washington, D.C. 20230. P-74410. OPIC.

3949—GERMANY—Large producer of bowling lanes and shooting ranges with corresponding equipment seeks licenses for manufacture of **recreational, health, physical fitness and exercising equipment** for spare-time and vacation-time. Established in 1938; employs 180. Ernst K. Spieth KG, P.O. Box 5080, D-7300 Esslingen 1 (street address: D-7300 Zell/Neckar, Fritz Mueller-Strasse 143), West Germany. Telex: 07 256 455; phone 0711/312071. P-74484.

6500—NIGERIA—U.S. capital and expertise is sought to **develop property** for housing, schools, in East Central State. Family enterprise has land, small amount of capital to contribute to project. Foreign Investment Services Staff, Room 4021, U.S. Department of Commerce, Washington, D.C. 20230. P-74429.

6512—SAUDI ARABIA—Prominent businessman is seeking a 50-50 joint venture with an American firm to develop a $7 million **shopping center/hotel complex.** Alternatively, hotel section could be established as an apartment building. Preliminary concept calls for shopping mall encompassing eighty 30-square-meter shops and a 250-room hotel. Foreign Investment Services Staff, Room 4021, U.S. Department of Commerce, Washington, D.C. 20230. WTDR. P-74466.

7819—NIGERIA—U.S. joint venture partner is sought to to establish a **laboratory for processing and printing color and black and white motion picture films** including editing, sound recording and dubbing facilities. Forty percent of the equipment for facilities has been acquired. Forty-five percent equity participation is open to U.S. partner. Foreign Investment Services Staff, Room 4021, U.S. Department of Commerce, Washington, D.C. 20230. P-74460.

Licensing and investment proposals from foreign firms are listed in these columns. Specific product interests in each proposal are highlighted in bold type to facilitate identification and each proposal is preceded by the appropriate four-digit product n u m b e r taken from the Standard Industrial Classification (SIC) Manual.

Background information on opportunities abroad and assistance on overseas investments are available from the Foreign Investment Services Staff, U.S. Department of Commerce, Washington, D.C. 20230. "P" numbers should be used when responding to any of the specific proposals listed.

WTDR indicates that a World Traders Data Report containing financial and background information on the foreign firm is available for $15 from the Export Information Division, Room 1313, U.S. Department of Commerce, Washington, D.C. 20230, or from any Commerce District Office.

OPIC indicates that the country involved is eligible for investment insurance coverage and financing from the Overseas Private Investment Corporation. Information regarding applicable coverage may be obtained from OPIC, Washington, D.C. 20527.

Licensing In U.S.

For additional information on these opportunities to manufacture foreign firms' products in the U.S. under a licensing agreement or in partnership, write the Investment Services Staff, Bureau of International Commerce, Room 4020, U.S. Department of Commerce, Washington, D.C. 20230 (202-967-2248), referring to the appropriate file number.

SWITZERLAND—A Swiss manufacturer is interested in a joint venture in U.S. for manufacture and distribution of its **household products** including lint remover, household brushes and novelty plastic items. **File 2485-R**

GERMANY—Large German firm whose present operations include iron and steel fabrication wants to acquire full or part ownership in a U.S. firm with modern steel production and rolling facilities for complete line of **carbon steel products.** Proposed scope of investment: $100 to $150 million. **File 2534-R**

GERMANY—A major German firm wants to acquire a medium-sized U.S. firm manufacturing **hydraulic equipment** of any kind, with modern facilities and well-established trade contacts in U.S. **File 2535-R**

SWITZERLAND — A leading manufacturer and packer of food and related items offers for licensing its new **ready-to-serve meals** which do not have to be stored in refrigerators or deep freezers. They can be kept at room temperature for several months. The meals, hygienically packed in aluminum trays which serve as containers during the warming process, now consists of lasagne, ravioli, fish gratin, canneloni and a special type of German meat loaf. These ready-to-serve meals, not requiring special storage, have gained 43 percent of the market in Switzerland in two years, according to the company. **File 2601**

SWITZERLAND — A small- to medium-size company is offering for manufacture in the U.S. its **aluminum suspension rails and special adjustable fastening bolts and screws** used in the building industry as part of a system to fix prefrabricated wall parts on steel structures. It is used principally in connection with building of industrial and commercial buildings of which walls often consist of prefabricated metal coverings, plastic or asbestos cement plates. **File 2602**

AUSTRIA—Individual is offering for manufacture in United States under license a **minibobsled.** Individual has applied for patent. **File 2603**

ENGLAND—Company wants to supply **quilt cases** to American company that can fill them with feathers and down. **File 2604**

GERMANY—Chemical company offers combined **cleaning, disinfecting and deodorizing substance** for bathroom use. **File 2605**

GERMANY—Chemist offers **formula for two-component rust-proofing procedure** which was awarded gold meal at Brussels inventors' fair. **File 2606**

GERMANY — Company offers **workshop equipment** for use in home or schools including table saws, planers, lathes, mortising machine, and bandsaw for working wood, plastics and light materials. **File 2607**

SWITZERLAND — Company offers a novel type of **dry shampoo for pets, a hair shampoo for human use, and a day and night skin cream. File 2608**

SWITZERLAND—Company offers for licensing in United States a new type of **waste disposal plant,** the operating principle of which is neither "standard incineration" nor "pyrolysis". By the system all materials reportedly are destroyed and are not recuperable. The hot

gases emanating can be used for energy production. Plant of this type is being built in Tokyo. **File 2609**

SWITZERLAND—Communications equipment manufacturer offers an **electronic avalanche victim detector.** It is small, battery-operated device to be carried in pockets by skiers and other persons exposed to danger of avalanches. The device sends or receives signals to distance of 60 meters. **File 2610**

SWITZERLAND—Company offers a new line of **executive office chairs. File 2611**

Chemical Industry Meeting Set For Romania in October

The United Nations Industrial Organization (UNIDO) in cooperation with the Bucharest Office of the Joint Unido/Romania Centre is sponsoring an investment promotion meeting and technological consulations for chemical industries of developing countries. The meeting is to be held from Oct. 7-11 in Bucharest, Romania.

The objective of the meeting is to bring together, on a worldwide basis, proponents of specific public and private sector industrial projects and possibilities of cooperation in undertaking projects in developing countries. Discussions will cover areas such as: joint ventures, financing, technical collaboration, licensing, management and export marketing. The meeting will also provide opportunities during plenary sessions for all those concerned with chemical industries to discuss the problems of these industries in the developing countries under the existing conditions of the world economy.

Proponents of projects in developing countries will be requested to complete and submit questionnaires explaining their proposals. Enterprises in industrialized countries will be invited to submit their own proposals for industrial cooperation.

Direct inquiries regarding the meeting to A. J. Aizenstat, Director, UNIDO New York Liaison Office, 799 United Nations Plaza, New York, N.Y. 10017. P-74492.

Malaysian State Seeks Foreign Investment

The State of Negri Sembilan is actively encouraging foreign investment, according to a recent report from the U.S. Embassy in Kuala Lumpur. Negri Sembilan, which comprises an area of 2,565 square miles, is bordered on the north by Selangor, east by Pahang, and south by Malacca and Johor. Agriculture is the primary industry with rice and rubber the main crops. Port Dickson is the site of the only two petroleum refineries in Peninsula Malaysia.

The State offers several advantages, including proximity to Kuala Lumpur, sufficient industrial estates, ample labor at competitive rates and investment inducements. State officials are promoting industrial development and seek manufacturers of vehicle spare parts, machine tools and agro-based products. Foreign investors can obtain assistance in locating land and qualify for tax relief. A copy of the report is available from Foreign Markets Report Unit, Room 1033, U.S. Department of Commerce, Washington, D.C. 20230; refer to DIB-74-08-001. P-74426.

Bulgarian Government Seeks License For Weather Rockets

A Bulgarian Government organization is seeking a license for weather rockets to break up hailstone clouds. Firms interested may telex or write in English to Engineer Rosa Raikova, First Department, TECHNIKA, 10 Graff Ignatiev, Sofia, Bulgaria. Telex: 22277 BG.

Foreign Trade Inquiries

These trade opportunities are based on reports received from the U.S. Foreign Service by the Trade Opportunities Division, Room 1322, U.S. Department of Commerce, Washington, D.C. 20230. The commodities in which foreign firms have interest are indicated by the five-digit numbers and commodity classifications which are from the Standard Industrial Classification (SIC) Manual and the Numerical List of Manufactured Products, 1972 Census of Manufacturers.

U.S. firms should be aware that the listing in Commerce Today *of opportunities to trade in specific commodities and technical data does not necessarily imply approval of their export by the Department of Commerce pursuant to the Export Administration Act of 1969. Applicable export licensing regulations must be followed.*

Every effort is made to include only traders with good reputations. However, the Department cannot be responsible for any trade relations.

WTDR indicates that a World Traders Data Report on this specific firm is available at $15 from the Export Information Division, Room 1313, U.S. Department of Commerce, Washington, D.C. 20230. A WTDR is a trade profile which contains commercial information including financial references, on an individual foreign firm. Orders must include complete name and address of the subject firm and be accompanied by payment. Further information concerning WTDRs and request forms are available at each Commerce District Office.

The mark (•) indicates that this trade opportunity is a request for bids by a foreign government agency.

Direct Sales

Building construction

15100—PERU—Tender for construction of poultry feed manufacturing plant (Oficio No. 407 DGP-74). Plant capacity will be 12,000 metric tons per year (25 percent powdered and 75 percent in pellets or granulated). Raw materials to be used: corn, 56 percent; cotton cake, 3.5 percent; fish meal, 10 percent; rice dust, 10.8 percent; alfalfa flour, 1.5 percent; bran, 7.3 percent; salt, .5 percent; bone flour, .1 percent; shell flour, 3 percent; molasses, 7 percent; and other additives, .2 percent. Plant location will be Valle de Jequetepeque Pacasmayo, northern Peru. Project is financed by the Agro-Industrial Cooperatives of Jequetepeque Valley. For additional information, write to Ing. Willy Bezold Salinas, Director General, Sistema Nacional de Apoyo a la Movilizacion Social Onams, Oficina de Planificacion, Centro Civico, 4th Piso, Lima 1, Peru.

Construction

• **16100—PERU**—Tender for construction of five sections of second stage (between Huanuco and Aguaytia) of Oroya-Agyuaytia Highway in Huanuco and Loreto States, central Peru. Estimated value of all of these projects (designated Carretera Oroya-Aguaytia-Proyecto II, Etapa-Fase I) is $19 million. A list of the projects which provides information on their size, approximate cost, etc. is available from Construction & Building Materials Program, Room 2118, U.S. Dept. of Commerce, Washington, D.C. 20230 (telephone: 202-967-3602), and the U.S. Dept. of Commerce District Office, 11444 Federal Bldg., 450 Golden Gate Ave., P.O. Box 36013, San Francisco, Calif. 94102 (telephone: 415-556-5864).

Documents and specifications are available (cost: S/20,000—US$461—per project section) until Sept. 2 at the Ministerio de Transportes y Comunicaciones, Direccion de Construcciones, Division de Obras con Financiacion, Av. 28 de Julio 800, 4th Piso, Lima 1, Peru. Any consultation can be made in writing to this address up to Sept. 6. Bids for each section are requested and will be accepted until Sept. 20. Correspondence in Spanish requested.

Project is financed with funds provided by the Government of Peru and the World Bank.

Textile goods

2293019 — JAPAN — Elbow & knee pads, vinyl coated. Estimated annual purchase, U.S. $25,000. This is mail order house specializing in outerwear shirts & football equip. Reply to: T. Nakamura, V.P., Young Bros., 19-3, Honmachi 1-Chome, Toyonaka City, Osaka 560. Tel. 06-854-6652.

Wood products

• **2491118—IRAN**—Satkab Co., Takkte Jamshid Avenue, No. 41/1, Tehran, Iran requests bids for 100,000 (one-hundred thousand) wooden poles and cross arms for overhead power transmission in Villagesm. Tender documents to prospective bidders available for 10,000 rials (approximately U.S. $150). Payment should be made to Bank Markazi Iran, Account No. 790. Bid deadline Oct. 16.

Public building, related furniture

• **25300—GREECE**—Ministry of National Education, Kate Special Project Service, 19-23 Kalamiotou St., Athens, has issued a tender for supply, installation and delivery in operational condition of educational equipment and furniture for five higher technical educational centers. Bid deadlines are Oct. 14, and Oct. 15. Tender documents (ten series) are obtainable from above address at prices indicated in bid invitation. Total cost 4,182 drachmas ($139.40) including $23.23 (20 percent of value) postage. This is a reissue of a tender initially held in October 1973. Copies of tender announcement and specifications are available from above address or on short team loan basis to firms located in the United States from the Science and Electronics Division, Room 1003, U.S. Department of Commerce, Washington, D.C. 20230, telephone 202-967-2328.

Drugs

• **28300—ALGERIA**—Supply of wide variety of pharmaceutical preparations for human consumption and veterinary use. Tender No. MP/74-75, with a bid deadline of September 30, 1974. Directeur General, c/o Le Pharmacien Directeur, Usine D'El-Harrach 6C,

Pharmacie Centrale Algerienne, 35 Avenue Cardinal Lavigerie, El-Harrach, Algiers. When received, specifications available in French from the Materials Division, Bureau of Domestic Commerce, Room 2126, U.S. Department of Commerce, Washington, D.C. 20230, telephone 202-967-3910.

Gum, wood chemicals

• **28690—BURMA**—Supply of 115,180 pounds of aviation anti-knock compound, orange in new returnable drums each containing about 886 pounds. Tender No. 6(T) CHEM-MOC/CR(74-75). Bid deadline Sept. 12. Procurement manager, 604 Merchant St., Nyanma Oil Corp., Rangoon, Burma. Copies of tender documents available from U.S. Department of Commerce, BDC/OBRA, Room 2126, Washington, D.C. 20230, telephone 202-967-3464. A review copy will also be available at the Department of Commerce District Office, Box 36013, Federal Bldg., 450 Golden Gate Ave., San Francisco, Calif. 94102, telephone 415-556-5864.

Steel mill products

• **33100—BOLIVIA**—9,000 tons of rails, "vignole" type. Bid deadline Sept. 17. Binational Railway Commission, Commission Mixta Ferroviaria Argentino-Boliviana, Avenida 16 de Julio, La Paz. Specifications available from Iron and Steel Program, BDC, Room 2007, U.S. Department of Commerce, Washington, D.C. 20230, phone 202-967-2438.

• **33100—BURMA**—5,000 Ltn of 75-lb. medium manganese flat bottom rails. Tender No. 12 (T) 60 (E) 74-75; bid deadline Sept. 16. Managing Director, Burma Railways Corp., Bogyoke Aungsan St., Rangoon. Specifications available from Iron and Steel Program, BDC, Room 2007, U.S. Department of Commerce, Washington, D.C. 20230, phone 202-967-2438.

• **33100—BURMA**—Various sizes and quantities of steel wire rope. Tender No. 35(T)P.I.C.(S) 74-75/1677; bid deadline Sept. 4. Paper Industries Corp., Central Research Organization Bldg., Yankin P.O., Kanbe, Rangoon. Specifications available from Iron and Steel Program, BDC, Room 2007, U.S. Department of Commerce, Washington, D.C. 20230, phone 202-967-2438.

• **33100, 33500—COLOMBIA**—165 kilometers of ACSR conductor and 55 kilometers of ⅜ diameter 7 x 3.18 mm. galvanized steel suspension cable. Tender No. 103; bid deadline, Sept. 9. Electrificadora de Antioquia S.A., Edificio de las Empresas Departmentales de Antioquia, Piso 8, Medellin. Specfications available at above address at 1,000 pesos.

• **33100—EL SALVADOR**—19,800 meters ductile cast iron pipe and fittings; 25,200 meters (m.) asbestos-cement pipe and fittings; 1,200 m. standard steel pipe; 5,400 m. galvanized steel pipe and fittings; 41,200 m. plastic pipe and fittings; all above in various diameters. Tender No. Licitacion IM 10/74; bid deadline Sept. 18. Administracion Nacional de Acueductos y Alcantarillados (ANDA), Edificio Commercial Pacifico, Avenida Sur 214, San Salvador. Specifications can be reviewed at above office or purchased at above office at $92. ANDA does not mail specifications.

• **33100—THAILAND**—120 km. ¼-inch diameter and 200 km. 5/16-inch diameter zinc-coated steel wire strand 7-wire type. Tender No. ADB-MEA-213; bid deadline Oct. 2. Purchase and Stores Department, Metropolitan Electricity Authority, Chakpetch St., Bangkok 2. Specifications available on loan from Iron and Steel Program, BDC, Room 2007, U.S. Department of Commerce, Washington, D.C. 20230, phone 202-967-2438.

• **33100—TUNISIA**—5,256 m.t. of steel rails as follows: 4,956 m.t. at 36 k./m. in sections of 18 m.; 150 m.t. at 46 kg./m., 18-m. sections; 150 m.t. at 50 kg./m., 18-m. sections. Bid deadline, as soon as possible. Abdelhakim Slama, President Directeur General, Societe Nationale des Chemins de Fer Tunisiens (SNCFT); att. Direction de l'Approvisionnement, 67 Ave. Farhat Hached, Tunis. SNCFT will provide details of rails to be supplied to firms which express interest.

• **33200—INDIA**—600 tons of carbon steel valve castings according to specifications ASTM A 216-70A grade WCB. Tender No. SP. S-313/C&F; bid deadline Sept. 14. Bharat Heavy Electricals Ltd., Tiruchirapalli 14, Tamil Nadu, South India. Specifications available from Iron and Steel Program, BDC, Room 2007, U.S. Department of Commerce, Washington, D.C. 20230, phone 202-967-2438.

3321533, 3321535—NORWAY — Cast iron, ductile, pressure pipe & fittings under 14 in. & over 14 in. Firm is supplier of pipe for drinking water supply to local international, N.Y., & several European concerns in related industries. Sales in region of $5 million. Call or telex Thorleif Armeberg, Mgr., Thorleif Arneberg & Co. A/S Kongensgate 17, Oslo 1. Tel.: 02336940; telex 18496. Direct sale & agency.

Secondary smelting, refining of nonferrous metals

3341231—UNITED KINGDOM — Beryllium copper. Estab. 1961, annual sales volume in region of $1,250,000. Requires beryllium copper for use in products they mfr. Reply to J. W. Squirrel, J. M. Harding (Worthing) Ltd., 4 Montague Place, Worthing, Sussex BN14 9AT. Tel.: 0903-37849; telex: 87339; cable address Harcontact, Worthing.

Rolling, drawing, extruding of nonferrous metals

• **33500—IRAN**—50,000 kg. bimetal copper-weld wire, 4 mm. diameter and 40 percent conductivity. Tender No. 823/53; bid deadline Sept. 21, 1974. Iranian State Railways, Tehran. Specifications available from Copper, Lead & Zinc Program, BDC, Room 2007, U.S. Department of Commerce, Washington, D.C. 20230, phone 202-967-2438.

• **33500 — IRAN** — Copper conductor for overhead transmission line. Tender No. S/160 CC; bid deadline Sept. 24, 1974. Ministry of Water and Power, Satkab Co., Takhte Jamshid Ave., No. 41/1, Tehran. Specifications available from Iron and Steel Program, BDC, Room 2007, U.S. Department of Commerce, Washington, D.C. 20230, phone 202-967-2438.

• **33500 — IRAN** — Various sizes and quantities of enamelled copper wire, bare copper wire. Tender No. 916/53; bid deadline Sept. 14, 1974. Iranian State Railways, Tehran. Tender documents available from Copper, Lead & Zinc Program, BDC, Room 2007, U.S. Department of Commerce, Washington, D.C. 20230, phone 202-967-2438.

Engines, turbines

• **35100—SINGAPORE** — Supply, installation and commissioning of the following power station equipment: (1) three units of 250 mw. reheat turbine generators complete with ancillary equipment, and (2) three matching 250 mw. reheat steam boilers. Bid deadline Jan. 2, 1975.

Manufacturers interested in ordering either or both items are to submit their applications in writing to: Project Manager, Monenco Asia (PTE) Ltd., 825 International Plaza, Anson Road, Singapore 2. A deposit of S $1,000 (US$1=S$2.46) is required for tender documents of each item. Copy of application should be sent to: Chief Electrical Engineer, Public Utilities Board, City Hall, Singapore 6.

• **35100—CYPRUS** — Supply, erection and maintenance of two 15 MW gas turbine generating sets. Contract No. 2958/10; bid deadline Sept. 20. The Electricity Authority of Cyprus, P.O. Box 4506, Nicosia. Tender documents are available from the above address on payment of 30 Cyprus pounds ($84.00) for a set of four documents.

• **35100—INDONESIA**—Mechanical and electrical equipment and materials for 200 MW thermal power plant. Tender No. 3485/DIR/74; bid deadline Nov. 1, 1974. Perusahaan Umum Listrik Negara (Indonesian National Electric Power Co.), Jalan Sunan Ngampel, Kebayoran Baru, Jakarta. Bidding documents comprise five volumes as follows: Volume I—Invitation and Instructions to Bidder, General and Special Conditions, Bond and Contract Forms and Equipment Data Sheets. Volume II—Steam Generators and Materials—Specifications. Volume III—Turbine Generators and Auxiliaries—Specifications. Volume IV—Electrical Equipment—Specifications. Volume V—Power Transformers—Specifications. Complete sets are available from Black and Veatch, International, 1500 Meadow Lake Parkway, Kansas City, Missouri 64144, on payment of $350.00 (not refundable).

Farm machinery

• **35200—PERU**—Sistema Nacional de Apoyo a la Movilizacion Social Onams,—Oficina de Planificacion,—Centro Civico, 4th Piso, Lima 1, Peru, requests as soon as possible bids on: Poultry feed manufacturing plant. Plant capacity, 12,000 metric tons per year (25 percent powdered and 75 percent in pellets or granulated). Raw materials to be used: Corn 56 percent, cotton cake 3:5 percent, fish meal 10 percent, rice dust 10.80 percent. Alfalfa flour 1.50 percent, bran 7.30 percent, salt 0.50 percent, bone flour 0.10 percent, shell flour 3 percent, molasses 7 percent and other additives 0.20 percent. Plant location: Valle de Jequetepeque, Pacasmayo, Northern Peru. Project financed by the Agro-industrial Cooperatives of Jequetepeque Valley.

Construction, mining, materials handling machinery, equipment

• **35300 — IRAN** — Iranian State Railways requests bids on 9 lifting jacks for wagons. Lifting capacity per jack, 16,000 kg. Delivery must be within 60 days of opening of a letter of credit. Bid No. 852/53 with closing of Sept. 7, 1974. Bidders required to deposit Rls. 1 million for participation in tender. Bid specifications available from U.S. Dept. of Commerce, Room 2806, Transportation and Capital Equipment Division, Washington, D.C. 20230, phone 202-967-4317.

Steel mill machinery

• **3541826—CZECHOSLOVAKIA** — ZENIT, Foreign Trade Corporation, seeks a U.S. supplier of scarfing machine for carbon steel billets from 100 to 250 mm diameter, up to 11 meters long, with resistance 50 to 90 KP/mm2. Chip removal capacity 4-5 dm2, 500 voltages. Companies interested should telex or airmail in English to Ing. Klecka, ZENIT, Gottwaldova St. 115, Ostrava 1, Czechoslovakia, Telex: 52504.

General industry machinery

• **354189—CZECHOSLOVAKIA** — ZENIT, Foreign Trade Corporation, seeks a U.S. supplier of N/C Lathes. Companies interested should telex or airmail in English to Ing. Klecka, ZENIT, Gottwaldova St. 115, Ostrava 1, Czechoslovakia, Telex: 52504.

• **3541890—CZECHOSLOVAKIA** — ZENIT, Foreign Trade Corporation, seeks a U.S. supplier of N/C wire electrochemical (?) sparking machine for machining airmotor blades. Voltage 5000-20,000v. Companies interested should telex or airmail in English to Ing. Klecka, ZENIT, Gottwaldova St. 115, Ostrava 1, Czechoslovakia, Telex: 52504.

• **35422—CZECHOSLOVAKIA** — ZENIT, a Foreign Trade Corporation, seeks a U.S. sup-

plier of presses for pressing carborundum grinding wheels. Companies interested should telex or airmail in English to Ing. Klecka, ZENIT, Gottwaldova St. 115, Ostrava 1, Czechoslovakia, Telex: 52504.

Fertilizer mills

• **35590—CZECHOSLOVAKIA** — ZENIT, a Foreign Trade Corporation, seeks a U.S. supplier of a fertilizer mill and dryer to reduce granules from 40 mm to 1 mm and humidity from 50 percent in raw materials to 22 percent in final product. Companies interested should telex or airmail in English to Ing. Klecka, ZENIT, Gottwaldova St. 115, Ostrava 1, Czechoslovakia, Telex: 52504.

Office, computing, accounting machines

• **35700—THAILAND**—The Foreign Purchasing Section, Supply & Procurement Dept., Electricity Generating Authority of Thailand, Nonthaburi, has issued Tender No. EGAT 50/2517 for the supply of: rental for a period of five years or purchase of computer system (replacing presently-used IBM 360/30 system with 64 K bytes storage capacity). Specifications are as follows: hardware; central processing unit (CPU); one central processor for commercial and scientific computation with main memory not less than 190 K bytes, etc.; the processor cycle time should be not greater than 350 NS.2 bytes; average storage access time not greater than 750 NS/2 bytes; disc storage unit to contain at least 4 drives, etc.; magnetic tape unit consisting of 4 tape drives, etc. printer unit capable of printing at least 132 print positions per line, etc. card read/punch unit capable of reading and punching standard 80 column cards, etc.; software operating system with supporting operations. Bid deadline is Oct. 1. Project is financed by EGAT budget. Tender documents obtainable at above address for $50 per one set of two copies.

• **35700—IRAQ**—Secretariat, MOI Computer Committee, State Organization for Textile Industries, Rafidain Bank Bldg., Rashid St., Baghdad, Iraq, has issued Tender No. 2 for supply, installation and maintenance of 38 visible record computers. Bid deadline, Sept. 14. Copies of tender announcement and specifications available on short-term loans to firms located in the United States from the Science & Electronics Div., Room 1003, U.S. Dept. of Commerce, Washington, D.C. 20230, telephone 202-967-2328.

• **35700 — NETHERLANDS/NATO** — USRADCO, SHAPE Technical Center, APO New York 09159, has issued Tender No. 9980/PCO/986/74/5063 for one rear port cathode ray tube (CRT) display unit comprising electrical system with CRT and final deflection and video (unblaking/blanking) amplifiers, optical system with projection lens and lamp and slide/film transport system. Some of minimum requirements are: CRT size, 400-610 mm.; video amplifier bandwidth. 6MC (-3DB); optical system, resolution 2 lines/ mm. on screen; slide/film transport system; capacity, 16/60 frames, figures should be achievable throughout total maintenance period registration error optical to electronic (worst case) should not exceed 1 percent of useful screen size. All units should be enclosed in a stylized cabinet. Power, 200 vac plus/ .. 8, 7 10 percent 45-60 hz, single phase. Display surface must be mounted at angle of 45 degrees to horizontal. No special purpose keys, buttons or data entry devices are required on unit other than those required for power switching, or electrical/electronic brightness level adjustment. Bid deadline Oct. 1, 1974, 5 p.m. Only firms certified by U.S. Dept. of Commerce eligible to bid on NATO procurements. U.S. firms interested in certification should contact Science & Electronics Div., Room 1001, U.S. Dept. of Commerce, Washington, D.C. 20230, telephone 202-967-2328. Copies of tender announcement and specifications available on short-term loan to firms in U.S. from Science & Electronics Div., Room 1003, U.S. Dept. of Commerce, Washington, D.C. 20230, telephone 202-967-2328.

Electrical industrial apparatus

• **36200—NIGERIA** — Three 4.2 megawatt diesel powered electric generaitng units with necessary power circuit devices and controls—Contract SC/2B; and fiv electrically operated pumps—Contract SC/3B. The General Manager, Chad Basin Development Authority, P.M.B. 1130, Maiduguri, North Eastern State.

Communications equipment

• **36600—EGYPT**—The Telecommunications Organization, Opera Bldg., Ataba St., Cairo, Egpt has issued Tender No. 15/74/19 for the supply and supervision of installation of 12 PCO-systems values and limits of each should be obtained in 4-wire measurements using two PCM multiplex terminal equipment. Bid deadline is Oct. 9. Copies of tender announcement and specifications available from above address or on a short term loan basis to firms located in the U.S. from the Science & Electronics Div., BDC-466, Room 1003, U.S. Dept. of Commerce. Washington, D.C. 20230, telephone 202-967-2328.

• **36600—INDIA**—The Director of Stores and Purchase, Oil and Natural Gas Commission, Tel Bhavan, Dehra Dun, U.P. has issued Tender No. IMP/GEOPHY/715/74 for the supply of digital grade geophones, basic unit only similar to: sensors SM-4." Number required 2000. Bid deadline is Sept. 25. Copies of tender announcement and specifications available on a short term loan basis to firms located in the U.S. from the Science & Electronics Div., BDC-466, Room 1003, U.S. Dept. of Commerce, Washington, D.C. 20231, telephone 202-967-2328.

• **36600—CHILE** — Departmento Tecnologia Educativa URC, Universidad Catolica de Chile, Alameda 340, Santiago, has issued a tender for television broadcast equipment and closed circuit system. Immediate response needed due to IDB deadline. Bid should offer two mobile cameras, two plumbicon cameras, zoom lens, wave monitor, synchronization equipment, videotape recorder, videotapes, audio/visual equipment, portable lighting equipment, maintenance equipment, and parts and accessories. Estimated cost $85,000 partially financed by IDB credit.

• **36600—INDIA** — Director General, Posts and Telegraphs Dak and Tar Bhavan, Parliament St., New Delhi, has issued Tender No. 12-104/74-MMD for common control crossbar type local telephone exchange equipment. Number of lines required is 57,000; estimated value, about $12 million. Bid deadline is Oct. 28. Copies available for RS 20 (about $2.75) per set, from Assistant Director General (Imports), Room NBR 514 (above address) by sending crossed demand draft in favor of Accounts Officer (C and A). Office of the Director General, Posts and Telegraphs, New Delhi.

• **36600 — INDIA** — Superintending Engineer (TECH) Tamil Nadu Electricity Board, 157 Anna Salai, Madras 600 002, Tamil Nadu, India, has issued Tender No. IDA/TNES/7 for supply of 1) power line carrier communication, telemetering, teleprinting and teleprotective equipment; 2) microwave communication equipment; and 3) load despatch equipment. Bid deadline, Sept. 30, 1974, 12 noon. Copies of tender announcement and specifications available from above address for $13.75 on demand draft in favor Deputy Financial Controller, Madras Electricity System (Distribution).

Motor vehicles, equipment

3711111—JAPAN — Antique "classic" automobile, one 1940 Chrysler Thunderbolt Roadster, in any condition so long as suitable for restoration. Buyer est. price at $5,000 but is not limited by this figure. Would like to examine photos & have detailed description of vehicle's condition. Restoration of antique & classic automobiles is hobby of Mr. Doi, who is also Pres. of Doi (Camera) Co. Ltd., major camera retailing firm with more than 70 outlets in Japan & office in N.Y. Reply to: Kimio Doi, Doi Co. Ltd., 12, 1-Chome, Hakataeki-Higashi, Hakata-Ku, Fukuoka, Japan 7. Tel. (092) 431-0002.

Instruments for measurement, control and analysis

• **38200—INDIA**—The Directorate General, Supplies and Disposals, Jeevabtara Bldg., Parliament St., New Delhi 110 001, has issued Tender No. P/514/PI/006/19/6/74 for a digital malfunction meter. Bid deadline is September 20. Copies of tender announcement and specifications available from the India Supply Mission, 2536 Massachusetts Ave., NW., Washington, D.C. 20008, at $1.50 per copy.

• **38200—INDIA** — The Member Secretary, Southern Regional Electricity Board, 355 Sadashivanagar, Bangalore 560006, Karnatka, has issued Tender No. IDA/SREB/2 for load frequency control equipment. Bid deadline Nov. 7, at 3 p.m. Copies of tender announcement and specifications are available only from the above address for $13.75 per copy.

Optical instruments, lenses

• **38300—ALGERIA** — The Direction Des Services Financiers, Comite Ministeriel Des Marbhes, Ministere De La Defense National Les Tagarins, Algiers, has issued Tender No. 6-74 Sante for the supply of three mobile hospitals; one with 100 beds and two with 200 beds. Bid deadline is September 15. Offers to be in duplicate, to include guarantee on material and on spare parts for one year, technical assistance, training personnel, and to remain valid 90 days past bid deadline. Variations on specifications acceptable. Delivery within three months of firm order. Correspondence and offers in French required, all specs. metric. Copies of tender announcement and specifications are available on a short term loan basis to firms located in the U.S. from the Science and Electronics Division, Room 1003, U.S. Department of Commerce, Washington, D.C. 20230 (202/967-2328).

• **38300—ALGERIA** — The Direction des Services Financiers, Ministere de la Defense Nationale Les Tagarins, Algiers, has issued Tender No. 5-74 Sante for the supply of 18 mobile medical vehicles: six equipped for dental services, six for X-ray, and six for medical consultation and therapy. Bid deadline is September 15. Offers to be in duplicate, to include guarantee on material and spares for one year, technical assistance, training of personnel, and to remain valid 90 days past bid deadline. Delivery within four months of firm order. Correspondence and offers in French required; all specs. metric. Copies of tender announcement and specifications are available from above address or on a short term loan basis to firms located in the U.S. from the Science and Electronics Division, BDC, Room 1003, U.S. Department of Commerce, Washington, D.C. 20230 (202/967-2328).

• **38300 — GREECE** — Ministry of Commerce State Purchases Directorate 2, 20 Canningos St., Athens, has issued Tender No. 172/74 for supply of an automatic photometric unit (by arithmetical indications). Bid deadline, Sept. 9, 1974. Purchases financed from Greek Government budget. Copies of tender announcement and specifications available from above address at no charge, or from short-term

loan to firms located in the U.S. from Science & Electronics Div., Room 1003, U.S. Dept. of Commerce, Washington, D.C. 20230, telephone 202-967-2328.

Surgical, medical, dental instruments

• **38400—SRI LANKA (CEYLON)**—The Department of Health, P.O. Box 584, Colombo, has issued a tender for physiotherapy equipment. Bid deadline is September 17. Copies of tender announcement and specifications available from the Embassy of Sri Lanka, 2148 Wyoming Ave., NW., Washington, D.C. 20008, or on a short term loan basis to firms located in the U.S. from the Science & Electronics Div., BDC, Room 1003, U.S. Dept. of Commerce, Washington, D.C. 20230 (202/967-2328).

Costume jewelry, novelties buttons, notions

39462—JAPAN—Hair curlers (except rubber, & except those designed for beauty parlor use.) Takayoshi Antono, Purchasing Officer, Gen. Merchandise, Overseas Dept., C6. The Dai'ei, Inc., 1-2 Nakatsu-Honodori Oyodo-Ku, Osaka.

Miscellaneous durable goods

• **50930 — CHILE** — Aluminum scrap, 980/0 aluminum; 350 m.t./yr. Approx. value: $260,000. Reply to: Carlos Cardoen, Gen. Mgr., Ireco, Montolin 182, Santiago. Tel. 742666.

Antique, secondhand stores

59310 — AFGHANISTAN — Used clothing. Mr. Abdul Wahid Kawkab, Proprietor, Kawkab Store, P.O. Box 258, Serai Sayed Habibullah, Kabul.

59310 — AFGHANISTAN — Used clothing. Buyer wants quotation c.i.f. Karachi, insurance up to Kabul. Mr. A. J. Tawakkul, Mgr., Tawakkul Store, Zarghoona Maidan, Kabul.

Software services

• **73700 — BELGIUM** — American Embassy, Brussels, has been requested by large Belgian distribution chain to provide names of U.S. firms supplying software computer packages covering the following market areas: 1) purchase order preparation; 2) merchandise department record keeping, recording and analysis of the commercial data connected with the merchandise; 3) warehouse reception; 4) store ordering procedure; 5) store reception; 6) invoice processing; 7) allocation; 8) warehouse physical control; and 9) merchandise accounting. Interested firms should contact U.S. Embassy, Brussels, APO New York 09667, for further information.

Motion picture production, distribution

• **78130—BRAZIL** — Educational films and film strips. Interested in importing for resale and in representation/distributorship arrangement. Very large firm considered leading technical book publisher and dealer in Brazil. Sells throughout Brazil and has representatives in Sao Paulo and Brasilia. WTDR 6/74. Reply to: Reynaldo Max Paul Bluhm, Dir. Pres., Ao Livro Technco, S.A., Av. Presidente Vargas 962-6 Andar, 20000 Rio de Janeiro, GB. Cable: Litecnico; Tel.: 223-1744.

Vocational Items Sought

The Melli Shoe Co., Tehran, Iran, is interested in purchasing 30 units of mobile training center for pipe fitting, welding, carpentry and masonry. The firm requests f.o.b. quotations and catalogs and delivery dates. Interested U.S. firms should write Melli Shoe Co., P.O. Box 2380, Tehran, Iran. WTDR 12/72.

Representations

Foreign private firms are interested in agency agreements and/or distributorships for these products.

Miscellaneous nonmetallic minerals, except fuels

14990 — AUSTRALIA — Blue sapphire, in particular Montana blue sapphire, mined at Yo-Go, Montana. Sapphires would be required to be cut and polished, in sizes from 1.5mm. up to 5mm. in square and round shapes. Wants to contact companies who can cut and polish these sapphires with a view to direct import. Reply to: K. B. Godfrey, Gemmologist, 61 Waratah St., Seacliff, Adelaide, SA 5049.

Pulp mills, products

26112 — UNITED KINGDOM — Bleached wood pulp; unbleached woodpulp; bleached softwood pulp; bleached hardwood pulp; semi-bleached wood pulp; unbleached wood pulp; soda woodpulp. Needs 10,000 tons ea. of bleached & unbleached wood pulp of all grades. Interested suppliers quote best competitive price for delivery as soon as possible. Reply to: Mr. Norman B. Sage, David Harrison (Embassy) Ltd., 61 Queen St., Bristol. Tel.: 0272 22922.

Steel mill products

• **3312011 — 3312013 — BOLIVIA** — Mine car rails, A.S.C.E. 5,000 m., 16 lb./yd. or 20 lb./yd. to be used in underground mines. WTDR 3/71. Reply to: Carlos Marin, Marin Hermanos, Casilla 111, La Paz.

Metal cans

• **3411191 — ECUADOR** — Sixty thousand cases ea. containing 48 1-lb. tin cans for packaging of sardines. Est. cost $300,000. Quote by cable both f.o.b. & c. & f. Guayaquil including indent agent's commission usually paid by individual supplier, against l/c. Commission percentage to be specified in cable. Cable: Pedro M. Faggioni, Mgr., Cedri-Corporacion Ecuatoriana de Representaciones Internationales Cia. Ltda., P.O. Box 5308, Guayaquil. Cable: Cedri; Tel. 518687. One-time sale on agency basis.

Fabricated structural metal products

3443926 — KOREA — Lp gas tank, 20 m.t./capacity, with vaporizer cap, other accessories. Claims it has located market for immediate supply of one lp gas tank with vaporizer cap & other accessories. Further states that it should be able to market at least 10 tanks within one yr. period of time & seeks agency agreement. Reply to: K. H. Chang, Trade Dept., Whashin Industrial Co., Ltd., CPO Box 1121, Seoul, 100. Cable: Whashin, Seoul; tel.: 27-3174.

Vienna Company Wants To Handle U.S.-Made Rifles

A Vienna firm is interested in becoming the exclusive dealer in Austria for U.S.-origin hunting and sporting rifles and shotguns, rifle and shotgun stocks, telescopic sights and ammunition. The company, a manufacturer of high quality hunting rifles and shotguns, is seeking to fill out its line of merchandise. Offers of the items wanted, with price quotations, are solicited. The firm corresponds in English, and will make payment by letter of credit or on a COD basis. Write Peter C. Fuchs, Sales Manager, Voere Ges. M.B.H., A-6330 Kufstein, P.O. Box 42, Vienna.

Greece Announces Purchase Program Topping $300 Million

Greece has approved the purchases program by Government and quasi-governmental agencies during calendar year 1974 amounting to $301.5 million.

Principal categories are: plant equipment $51.4 million; telecommunications equipment $51.3 million; electrical equipment $28.7 million; railway equipment $28.3 million; transportation equipment $22.4 million; chemicals $19 million; special projects $18.6 million; scientific instruments $16.1 million; parts & accessories $13.8 million.

This program does not include crude oil and other POL products; grains and other food stuffs by governments for private consumption; large power units and other electrical equipment incorporated in public power corporation projects.

The program offers opportunities for sale of U.S. equipment through tenders that will be invited throughout 1974. A list of tables summarizing the various categories of commodities planned for purchase is available from the Trade Opportunities Program, U.S. Department of Commerce, Rm 1322, Washington, D.C. 20230.

Indian Enterprise Seeks 'Float Process' Technology

An Indian enterprise proposes to set up a plate glass manufacturing plant based on the modern "float process", either in the public or private sector. However, neither the technology nor know-how is available in India.

Interested concerns with such capabilities should be in a position to provide the following information: (a) minimum economic size of a "float plant" for plate glass; (b) budgetary estimates for the cost of plant and equipment for such a plant; (c) a broad list of plant and equipment needed; (d) specific consumption of various raw materials required for manufacture of plate glass by the "float process"; and (e) process know-how, fees and royalties for construction of this type plant.

Interested concerns should quote reference "Q-6676 INDIA/1d" when inquiring about this project. All inquiries should be directed to WAFA KAMEL Industrial Inquiry Service, United Nations Industrial Development Organization (UNIDO), P.O. Box 707, A-1011, Lernchenfelder Strasse 1, A-1070 Vienna, Austria.

Poland Expresses Interest In Shipbuilding Equipment

Poland is presently considering the possibility of building LNG and LPG tankers at Polish shipyards. To carry out such construction Poland will require technical and material assistance from Western firms. The Polish Center for Shipbuilding Technology would like to establish contact with U.S. firms manufacturing equipment needed in ship construction and shipboard equipment. Of particular interest are the following areas: insulation material (polyurethane foam, fiberglass), cryogenics, cargo pumps, stripping pumps, valves, piping, and control and monitoring equipment (pressure, temperature, liquid level).

Firms interested in pursuing this lead, with a view toward sale of equipment, technology, or services, should contact Leszek Wylezal, Chief Designer, Center for Shipbuilding Technology, Centrum Techniki Okretowej, Waly Piastowskie 1, Gdansk, Poland. Telex 051474. For information on doing business in Poland, contact Daniel D. Stein, Trade Development Assistance Division, Bureau of East-West Trade, U.S. Department of Commerce, Washington, D.C. 20230, phone 202-967-3969.

Future Construction Abroad

BOLIVIA — The Bolivian Petroleum Co., Yacimientos Petroliferos Fiscales Bolivianos (YPFB), will construct an **8" pipeline from Santa Cruz to the Brazilian border** at Puerto Suarez. Construction to start March 1975. YPFB will build the line. The pipeline, approx. 650 kilometers in length, will carry 15,000 barrels per day of refined products to Brazil. Design is for 20,000 barrels per day. YPFB seeking hardware and, especially, pipe. Entire project will cost $28 million, pipe $15 million. For further information contact: Mr. Delfin Pozo, Yacimientos Petroliferos Fiscales Bolivianos (YPFB), Casilla No. 401, La Paz. A copy of the pipeline profile and pipe specifications (in Spanish) available on 3-day loan from U.S. Department of Commerce, Trade Opportunities Program, Rm. 1322, Washington, D.C. 20230.

BOLIVIA — The Bolivian Petroleum Co., Yacimientos Petroliferos Fiscales Bolivianos (YPFB) has decided to **expand the Santa Cruz refinery at a cost of $60 million.** Prequalifications from petroleum engineering consulting firms have already been invited. This expansion project is only one element of YPFB's current refinery expansion plans. Other main elements are a $65.3 million expansion and upgrading of the Cochabamba refinery, a $16 million lubricants plant in Cochabamba and $28 million for pipeline. U.S. petroleum equipment manufacturers may contact Mr. German Borda, YPFB, Casilla No. 401, La Paz, for further information. A copy of general plant specifications (in Spanish) available on 3-day loan from U.S. Department of Commerce, Trade Opportunities Program, Rm. 1322, Washington, D.C. 20230.

SAUDI ARABIA — Caudill Rowlett Scott, Architects, on behalf of College of Petroleum and Minerals, Dhahran, has released plans and specifications for furnishing and installing of **engineering and scientific laboratory equipment.** Bid deadline is Sept. 15. Total tender is comprised of two groups: Group (D)—purchase and delivery of specified manufactured laboratory equipment items with approx. value of $3 million. Group (E)—complete installation of equipment in Group (D) and certain other owner-furnished laboratory equipment. Installation work will include modifications to existing building structures and utilities. One contract will be awarded on basis of total tender amount of both Groups D and E. All interested parties are invited to submit to the architects, information consisting of, but not limited to, the following: financial statement of organization; list of corporate officers; list of projects successfully completed. Drawings and specifications may be purchased at the offices of the architect, F. Conrad Neal, Caudill Rowlett Scott, 1111 West Loop South, P.O. Box 22427, Houston, Texas 77027, or Robert Hendrickson, Caudill Rowlett Scott, c/o The College of Petroleum and Minerals, Dhahran, Saudi Arabia. A purchase fee of $100 in form of a company check, certified cashiers check, or international money order will be required for tendering documents, payable to the architect.

AFGHANISTAN—The president of the Telephone and Telegraph Department, Ministry of Communications, Kabul, plans **seven projects in communications systems** with total cost of D.N. 20 million. International tenders will be issued soon. The following is a rough description of the projects: Additional 4,000 telephone lines to be installed in northern Kabul. Additional 5,000 telephone lines to be installed in southern Kabul area. Additional 1,200 lines to be installed in Kabul northwestern suburban area. MF radio communications to be installed with 20 or 30 KW transmitter and three or four receivers. At least 3,000 new telephone lines (total) to be installed in Repart, Kandahar, and Mazar-I-Sharif. Copper wire carrier system to be extended from Mazar-I-Sharif to Maimana. Copper wire carrier system to be extended from Taliqan to Faizabad.

BELGIUM—Belgian Ministry of Communications (Regie des Voies Aeriennes) announced that the deadline date for submission of bids to participate in the construction of the new **airport passenger terminal** has expired. However, firms interested in supplying construction materials to those contracts awarded the various airport related projects should contact W. Van Roost, Director & Chief Engineer, Regie des Voies Aaeriennes, Avenue des Arts 41, B-1040 Brussels, Tel.: 02/511.19.00, in order to obtain information on name of contractors and projects to be constructed. Mr. Van Roost also stated that a project to expand freight terminal at the Brussels International Airport is currently under study by the Government of Belgium. Interested firms can obtain information on this project (bids to be publicized on or/about mid-1975) either from the Regie des Voies Aeriennes or from Sabena, Direction Administrative, Aeroport National, B-1930 Zaventem, Attn.: F. Malaise, Head of Department and A. Longueville, Civil Engineer. Bids and tenders can be either consulted in person or obtained against payment (unknown) at the Bureau des Adjudications, Rue du Luxembourg 49, B-1040 Brussels. Telegraphic address: Adjudications, rue du Luxembourg 49, B-1040 Brussels. Tel.: 02/513.14.47.

KENYA—The Government of Kenya has issued a prequalification notice for the **Kenya Coastal Water Supply Project.** It comprises: A—Supply of pipes and fittings for main and subsidiary bulk supply pipelines. B—Laying and construction of main subsidiary bulk supply pipelines, on-line tanks, bulk storage reservoirs and Jaribuni booster pumping station in the 25 km. wide coastal strip between the Sabaki River in the north and Port Reitz Creek in the south. U.S. contractors who wish to be included in the list of selected tenderers must obtain prequalifications. Prequalification applications must be submitted to: Scott Wilson Kirkpatrick & Partners, P.O. Box 44994, Nairobi, by Sept. 30. A copy of the "Contractor's Construction Qualifications Data Sheet" and a copy of the notice are available from the Trade Opportunities Program, U.S. Department of Commerce, Rm 1322, Washington, D.C. 20230.

THAILAND—A listing of new construction projects in Thailand is available from Trade Opportunities, U.S. Department of Commerce, Rm 1322, Washington, D.C. 20230.

SPAIN—Juan Contreras Fernandez, Director, Andaluza de Piritas, S.A., at the mine site in Aznalcollar, Seville, is planning new **mining projects.** Andaluza de Piritas, S.A. is owned by an important Spanish financial industrial group, of which the Banco Central is the principal member. This financial group, in cooperation with the German firm "Metalgesellschaft" has engaged in studies costing 500 million pesetas and lasting four years. These studies indicate deposits of some 52 million tons of pyrite mineral; to extract this mineral will require an open pit more than two kilometers in diameter to move some 15 million tons of sterile land. This first phase represents an investment of some 8 billion pesetas and it is expected to yield 40,000 tons per day of pyrites, representing 50% of the copper and zinc concentrates and 30% of the lead produced in Spain through the flotation process. The second phase will consist in extracting and utilizing the iron and sulphur contained in the pyrites which have already undergone the flotation process. This will require constructing metal-chemical factories. The third project under consideration involves transforming the concentrates of copper, lead and zinc into finished metals. This would require a large siderurgical complex. The initial excavation process, earth movement and building of the infrastructure, will take three years. This project represents an outstanding possibility for the sale of U.S. mining equipment in Spain.

GHANA—The Public Works Department issued prequalifications in December 1973 and bids closed Aug. 15 to contractors on the first three stages of the **rehabilitation of 340 miles of main trunk roads** to be financed under a $13 million IDA loan.The entire project will be split into 13 projects and phases over a three-year period. In about four months announcement of registration for another prequalification questionnaire will be made. Scott-Wilson Kirkpatrick and Partners (British) are consultants for the entire scheme. Responsible Officers: Edward Francois, Chief Engineer; H. D. Pappoe, Project Manager, both at Public Works Department, Post Office Box 136, Accra, Ghana.

GHANA — Electricity Corp. of Ghana (E.C.G.), plans **expansion of the low voltage distribution system** around Accra, Tema, Kumasi, and Takoradi. E.C.G. asked Lahmeyer (German firm) to do a feasibility study on the project and the Board of Directors are presently studying this report to determine if the job can be completed with local financial resources or whether an IDA loan will be necessary. No list of materials or equipment to be used is presently available. E.C.G. engineers mention shackle insulators and stay roads as two items which will definitely be procured from abroad. If the project is IDA-financed tenders will be issued. Responsibile Officer: Y. Opong, Assistant Chief Engineer, Electricity Corp. of Ghana, P.O. Box 2394, Accra.

NIGERIA—A copy of a Nigerian Federal Government press release announcing a **reorganization of the Federal Works Registration Board,** and providing registration procedures required for building, civil engineering, mechanical and electrical contractors who wish to establish their eligibility to bid on Nigerian Federal Government contracts, is available from the Trade Opportunities Program, U.S. Department of Commerce, Rm. 1322, Washington, D.C. 20230.

CHILE—Government of Chile is planning in conjunction with Romania construction of **two copper ore reduction plants,** in Chile and Romania respectively. Each plant will have designed capacity to produce 35 to 40,000 MT of refined copper annually. Plant's construction is scheduled to start in mid-1975. Part of the foreign costs may be met through EXIM credit lines to Romania. Interested firms may wish to contact: Prominn, Promotora de la Minera Ltda., Casilla 2659, Santiago, Attn.: Sr. Miguel Yoma, Gerente, Telex: SGO 297 Metal, Telephone 89414.

JAPAN—To ease increasing urban traffic problems, the city of Kitakyushu (population 1,100,000) plans to construct an **urban monorail system** for passenger transportation. The city will complete its planning in Japan Fiscal Year 1975 and hopes to have the system in operation in Japan Fiscal Year 1979. Current plans call for a bestraddling type, computer-operated system covering a distance of 8.7 kilometers with trains operating at a speed of 30 kilometers per hour. The city is seeking a system which will produce a minimum of noise and will include air conditioned cars. Estimated cost of the system is 50 billion yen (currently about U.S. $1.67 billion), divided about equally between purchase of land and cost of con-

struction. Although no contracts have been signed yet, it appears certain that a major Japanese firm will be awarded prime responsibility for construction. However, there are sales possibilities for U.S. firms which manufacture monorail-related equipment and devices, safety devices, and computer systems for train operation. U.S. firms interested may contact Masaya Oishi, Chief Railway Construction Dept., Kitakyushu City Government, 1-1 Jonai, Kokura Kita-ku, Kitakyushu, Japan 803.

CANADA—The tender call scheduled for July/August marked the first step in the construction of Montreal's **sewage treatment system** announced by the Montreal Urban Community (MUC) in 1971. Additional tenders will be called at regular intervals until the system is completed in about three years, with each contract calling for the construction of some 30,000 ft. of sewer. The MUC expects to have six contracts let by this time next year. The interceptor sewers, 8 or 9 feet in diameter, will be built 70 to 80 feet below ground level, in solid rock. A representative of the MUC's Water Purification Office mentioned that U.S. firms have developed specialized tunneling equipment which would be well-suited for this type of work. He expressed the hope that U.S. firms would tender on the contracts. As is the case with the Montreal subway extension, the tender documents for these contracts will be available in French only and the tenders must be submitted in French. Water Purification Office officials said they will be pleased to be as helpful as possible in connection with the language factor. U.S. suppliers of advanced sewage treatment equipment and processes, and others wishing to express interest in this project, may write to the coordinator: Jean Marcotte, Director, Water Purification Office, Montreal Urban Community, 2620 St. Joseph Blvd. East, Montreal, P.Q. Canada H1V2A4. Telephone: 514-872-6842.

ARGENTINA—The Argentine Atomic Energy Commission (CNEA) has announced plans to set up **three new plants** to 1) fabricate reactor fuel elements; 2) produce heavy water; and 3) recycle their fuel wastes. The fuel fabrication plant is first on the horizon and is planned for an output of about 300 tons per annum, sufficient to provide reload fuel for their three currently planned natural uranium power reactors. One of the reactors, at Atucha, is already in operation; the second at Rio Tercero in Cordoba Province, has been contracted for; the third is still in the planning stages, but will probably also be located at Atucha. Certain equipment items, such as the ovens, welding equipment, mixers and grinders, and the Zircaloy tubing for the fuel elements, are likely to be tendered internationally. Total value of these items is estimated at approx. U.S.$1 million. The call for bids, particularly for the Zircaloy, could come as early as mid-1975. Interested U.S. suppliers should contact Ingeniero Juan Carlos Di Primio, Comision Nacional de Energia Atomica, Avenida del Libertador 8250, Buenos Aires, Argentina.

MEXICO—In tune with the expanding commercial life of Guadalajara, a modern, ten-floor **office building,** Condominio Union, is being erected at the corner of Union and Lopez Cotilla Sts., not far from downtown Guadalajara. The building boasts air conditioning, luxury elevators, marble facings, polarized glass, interior gardens, special lighting, and an emergency power system. The building should be ready for occupancy in mid-1975. U.S. vendors of construction and office supply equipment may contact the develepor: Arquitecto Inocencio Sanchez Barba, Dolmen de Guadalajara, Lopez Cotilla 1794, No. 203, Guadalajara, Jalisco, Mexico, Tel: 159557 or 153889.

SWEDEN—Beijer Food AB, a wholly-owned subsidiary of Beijer Invest AB, is expanding its operations for processing crustaceans and meat products. The Marketing Manager of Beijer AB is seeking U.S. firms capable of quoting on **cold storage, deep and quick-freezing plants.** Beijer's plans are not yet fixed since they will depend on offers, prices and proposals; they also will consider proposals that include some aspect of leasing. Interested U.S. firms should address full proposals (together with Bona Fides) to: Thomas Soderlind, Marketing Manager, Beijer Food AB, Fack, S-103 80 Stockholm 7. Cable: BEIJERFOOD, Stockholm. Telex: 19327 BEIJERS, Stockholm. Tel.: 08/22 82 60.

HONG KONG—A **pilot sewage plant** at Shek Wu Hui, near Fanling, New Territories has been commissioned. In the following two-year experimental operation, various processes for preventing future pollution from sewage will be evaluated. This is the first stage of a program to treat essentially all of Hong Kong's sewage, heretofore dumped into the surrounding waters after only perfunctory screening. The preliminary timetable for installation of sewage treatment plant facilities for all of Hong Kong wiill be determined during the April 75-March 76 fiscal year. The first plant to be built will be mainly for domestic sewage, but will handle some textile factory wastes. It will consist of two stages, each of which will serve a quarter million people. The anticipated disposition of sludge will be via digestion, dehydration and incineration. Potential long term sales of plant, equipment and engineering services are in the tens of millions of U.S. dollars. Interested U.S. firms may wish to contact: Principal Government Civil Engineer, Public Works Dept., Civil Engineering Office, 5/F, Murray Building, Garden Rd., Hong Kong.

JAMAICA—A **large-scale dairy project** which is to produce about one million gallons of milk annually beginning in 1977 was announced by Serge Island Dairies Ltd. The project is estimated to cost U.S.$3.2 million. It represents a joint venture between Serge Island Factory Ltd. and the Commonwealth Development Corp. The venture will be sited on 1,700 acres owned by Serge Island Sugar Factory. Most of the land is presently used in sugar cane cultivation. One thousand acres will be allotted to raise a total stock of 2,400 dairy animals, while the other 700 acres will be used for forage crops such as sugar cane, grass for hay-making, and silage corn. The milking herd will consist of 1,200 animals to be raised on four different pasture lots of 250 acres each. A milking complex will be attached to each pasture. Interested U.S. suppliers of milking machinery, milk storage vats and milk processing machinery should contact: Mr. H. O. Pengelley, Seaforth P.O., St. Thomas, Jamaica.

Future Construction Summary Available

A quarterly summary of future construction projects abroad, contract award stories and significant foreign government tenders in *Commerce Today* and *Commerce Business Daily* during April, May, June 1974, is available to U.S. firms from the Trade Opportunities Program, U.S. Department of Commerce, Rm. 1322, Washington, D.C. 20230. A pre-addressed mailing label should be included with the request.

The summary, which may also be reviewed at Commerce District Offices, alphabetically lists project summaries by country in five distinct classes: airport, seaport, railroad and highway projects; hydro and thermal electric plant and irrigation projects; hospital, hotel and housing projects; industrial plant projects; and comprehensive development projects. Whenever possible, names of contractors and responsible agencies are cited, as well as original publication dates.

A limited number of copies of the first quarter 1974 summary are also available upon request and will be distributed on a first-come basis.

Austrian Company Seeks Distribution Arrangements

The Austrian firm, VOWA, Dr. Klocker & Co., Hallerstrasse 165, A-6040 Innsbruck, is interested in negotiating distributorship arrangements with U.S. firms for any kind of product or product categories requiring intensive marketing and servicing. The firm's activities cover the entire Austrian and neighboring markets, particularly Switzerland, southern Germany and northern Italy.

The firms employs a staff of 280 and reports an annual turnover of $3 million. It operates extensive warehousing and service facilities, including 20,000 sq. ft. of covered and 80,000 sq. ft. of open air storage space. Its present activities are in the automotive field, but the firm wishes to diversify. Interested U.S. firms should write directly to Dr. Klocker at the above address, and send information copies to the U.S. Embassy, 1X Boltzmangasse 16, A-1091, Vienna, Austria.

Serbian Hospital Enterprise Seeks U.S. Medical Equipment

The Director of the Belgrade Mothers and Children's Hospital, Dr. Vukan Cupic, has announced that the Republic of Serbia, in Yugoslavia, will shortly allocate funds for the purchase of medical equipment. Initially this will amount to $971,277 which may be supplemented by additional funds in 1975.

Dr. Cupic expressed a strong preference for U.S. equipment. Inquiries may be referred to the Yugoslav import agent Jugolek, Kosovksa 10-14, Belgrade 11000. A list of the items which will be required is available from the Trade Opportunities Program, U.S. Department of Commerce, Rm 1322, Washington, D.C. 20230.

Kuwait Wants Specialists For Construction Plants

Kuwait is looking for consultants with capabilities in construction of plants for asphalt refinery with blown asphalt unit using the residue of distilled crude oil of Kuwait, and a plant for packing the bitumen using one of the following alternatives: (a) polyethylene valve bags of lay-flat film; (b) metallic drums or (c) any other practical method of packing.

Replies should be provided in duplicate. Please quote Ref: ("Q-6912-6913 Kuwait/1d."). All inquiries should be directed to WAFA KAMEL, Industrial Inquiry Service, United Nations Industrial Development Organization (UNIDO), P.O. Box 707, A-1011, Lernchenfelder Strasse 1, A-1070 Vienna, Austria.

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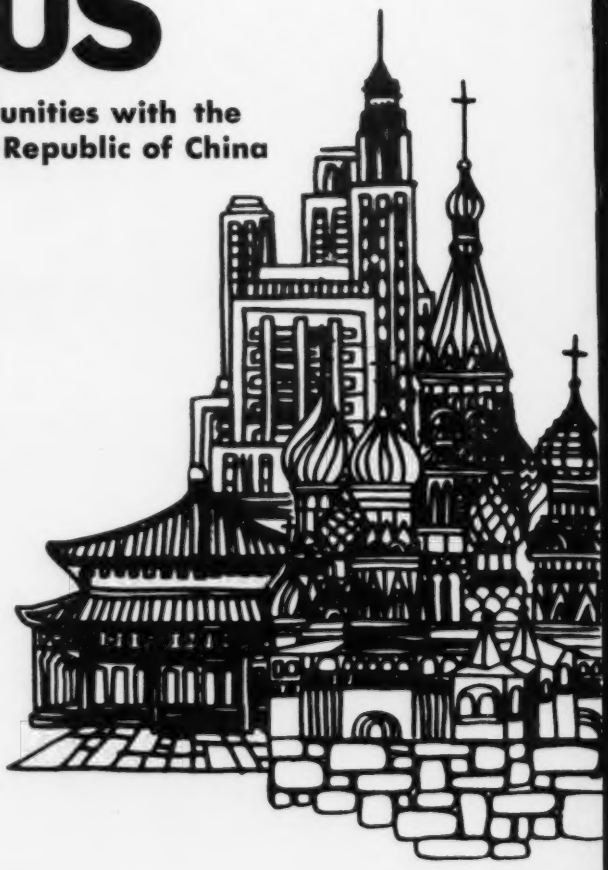

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